

Canadian Geographical Journal

JULY
1936

VOL. XIII
No. 3



25c A COPY

\$3.00 A YEAR



ONTARIO

PROVINCE of ONTARIO

THE SPOT FOR GOLD



The province of Ontario contains 407,262 square miles, and sixty-five percent of this vast area is underlain by rocks of the pre-Cambrian age, and favourable for the occurrence of minerals. Much the larger part lies north and west of Lake Nipissing. The silver mines of Cobalt, South Lorrain, and Gowganda, the nickel-copper-platinum deposits of Sudbury, supplying over 85 per cent of the world's nickel, and the iron ores of Michipicoten abundantly testify to the mineral riches of this region.

But in addition to this, Ontario is now pre-eminently a gold producing province and ranks fourth in the list of gold producing countries of the world.

The laws regarding the taxation of mines by the province are fair and just and the rate is lower than in any of the other important gold producing provinces. For all mines except nickel the method of computation has never been changed since 1907 when the present Act came into force. In the case of the small profit making mines, which account for the majority, there has been no change either in method of computation or the rate. In 1917, owing to war conditions, both the method of computation and rates were raised on nickel mines. The rates were also increased on all high profit making mines. With this exception Ontario can boast of having had stability of mining taxation for thirty years.

For Geological Reports and Maps and latest list of Publications

APPLY TO

T. F. SUTHERLAND
Deputy Minister

Deputy Minister, Department of Mines,
Parliament Buildings, Toronto, Canada.

HON. PAUL LEDUC
Minister

The Canadian Geographical Society

OTTAWA, CANADA

HONORARY PATRON:

His Excellency the Right Honourable LORD TWEEDSMUIR, G.C.M.G., C.H.
Governor General and Commander-in-Chief of the Dominion of Canada.

J. B. TYRRELL, M.A., LL.D., F.G.S., Honorary President A. P. COLEMAN, M.A., Ph.D., F.R.S., Honorary Vice-President

BOARD OF DIRECTORS:

CHARLES CAMSELL, C.M.G., B.A., LL.D., President

<p>CHARLES G. COWAN, Vice-President MAJOR GEN. A. G. L. MCNAUGHTON, Vice-President LT. COL. G. L. P. GRANT-SUTTIE, Vice-President E. S. MARTINDALE, B.A.Sc., Honorary Secretary</p>	<p>Hon. W. A. BUCHANAN, Vice-President O. M. BIGGAR, K.C., Honorary Counsel K. G. CHIPMAN, Honorary Treasurer</p>
<p>HON. A. E. ARSENAULT, Assistant Judge, Supreme Court, Charlottetown, P.E.I. MARIUS BARBEAU, National Museum of Canada, Ottawa, Ontario. ARTHUR BEAUCHESNE, Clerk of the House of Commons, Ottawa. THOMAS BELL, Saint John, N.B. F. E. BRONSON, President and Managing Director, The Bronson Company, Ottawa. LAWRENCE J. BURPEE, Secretary for Canada, International Joint Commission, Ottawa. COL. W. W. FOSTER, Vancouver, B.C. K. A. GREENE, Ottawa. F. C. C. LYNCH, Department of Mines, Ottawa.</p>	<p>A. STANLEY MACKENZIE, Halifax, N.S. L. T. MARTIN, Ottawa. DUNCAN McARTHUR, Deputy Minister, Department of Education, Toronto, Ont. W. C. MURRAY, President, University of Saskatchewan, Saskatoon, Sask. O. D. SKELTON, Under-Secretary of State for External Affairs, Ottawa. H. M. SNYDER, Montreal. E. J. TARR, Winnipeg, Man. GRIFFITH TAYLOR, University of Toronto, Toronto, Ont. THOMAS VIEN, Barrister, Montreal, P.Q. J. A. WILSON, Controller of Civil Aviation, Department of National Defence, Ottawa.</p>

Editorial Committee:

<p>Hon. W. A. BUCHANAN, Lethbridge <i>Chairman</i></p>	<p>MARIUS BARBEAU, Ottawa</p>	<p>GORDON M. DALLYN <i>Secretary</i></p>
<p>LT. COL. G. L. P. GRANT-SUTTIE, Toronto FRANK SMITH, Toronto</p>	<p>OLIVER MASTER, Ottawa N. A. ROBERTSON, Ottawa</p>	<p>F. C. C. LYNCH, Ottawa W. EGGLESTON, Ottawa</p>

Executive Secretary:

GORDON M. DALLYN

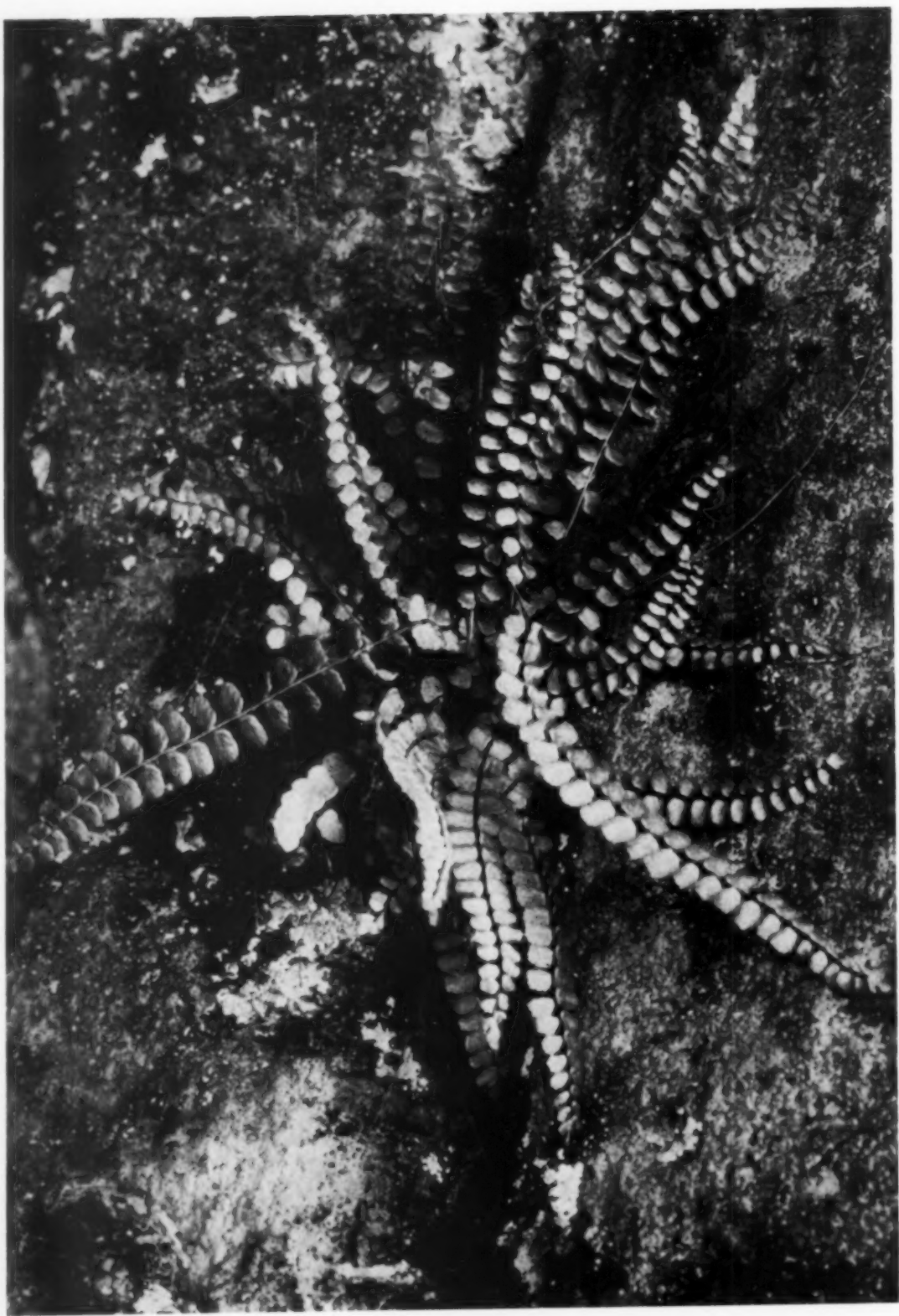


The Society's ambition is to make itself a real force in advancing geographical knowledge, and in disseminating information on the geography, resources, and peoples of Canada. In short, its aim is to make Canada better known to Canadians and to the rest of the world.

As one of its major activities in carrying out its purpose, the Society publishes a monthly magazine, *Canadian Geographical Journal*, which is devoted to every phase of geography — historical, physical, and economic — first of Canada, then of the British Empire and of the other parts of the world in which Canada has special interest. It is the intention to publish articles in this magazine that will be popular in character, easily read, well illustrated and educational to the young as well as informative to the adult.

The *Canadian Geographical Journal* will be sent to each Member of the Society in good standing. Membership in the Society is open to anyone interested in geographical matters. The annual fee for membership is three dollars.

The Society has no political or other sectional associations, and is responsible only to its membership. All monies received are to be used in producing the *Canadian Geographical Journal* and in carrying on such other activities for the advancement of geographical knowledge as the funds of the Society may permit.



This exquisite fern, the Maidenhair Splenuort, *Asplenium trichomanes*, prefers to grow on shaded cliffs. It is sufficiently rare to make its find a real delight.

CANADIAN GEOGRAPHICAL JOURNAL

Published monthly by THE CANADIAN GEOGRAPHICAL SOCIETY

BROCK BUILDING 172 WELLINGTON STREET - OTTAWA

Editor

Gordon M. Dallyn

This magazine is dedicated to the interpretation, in authentic and popular form, with extensive illustration, of geography in its widest sense, first of Canada, then of the rest of the British Commonwealth, and other parts of the world in which Canada has special interest.

Contents

JULY 1936

VOLUME XIII, No. 3

COVER SUBJECT—*An intimate study of The Western Canadian Prairies, from a painting by Edward Roper.*

	PAGE
EARLY SCENES FROM WESTERN CANADA, by GLADYS CHRISTENA McDONALD	115
FERNS IN CANADA, by GRACE FRASER MALKIN	127
SAILING IN A COASTWISE KETCH, by BONNYCASTLE DALE, JR.	145
CHIEFTAINNESS—MARY CAPILANO, by NOEL ROBINSON	153
VENICE—QUEEN OF THE ADRIATIC, by W. HARVEY-JELLIE	161
EDITOR'S NOTE BOOK	IV
AMONGST THE NEW BOOKS	VII

• • • • •

The British standard of spelling is adopted substantially as used by the Dominion Government and taught in most Canadian schools, the precise authority being the Oxford Dictionary as edited in 1929.

Contents of this Journal are copyright.

Address communications regarding change of address, non-delivery of Journal, etc., to The Canadian Geographical Society, 172 Wellington Street, Ottawa, Canada, giving old and new address. On all new memberships, the expiry date will be printed on wrapper containing starting number. This will constitute a receipt for subscription.

Member Audit Bureau of Circulations.

Membership fee is \$3.00 per year in Canada and other parts of the British Empire, which includes delivery of the Journal, postpaid; in United States and Mexico, \$3.50; in other countries, \$4.00. Make membership fee payable at par in Ottawa.



A Blackfoot Chief in full ceremonial costume.

EARLY SCENES FROM WESTERN CANADA

by GLADYS CHRISTENA McDONALD

Illustrations from paintings by Edward Roper

IN Canada we are justly proud of our 400 years of history since Jacques Cartier landed in the New World. Innumerable books describing this romantic heritage all contribute to a better appreciation of our present day life. Pictures, also, both as illustrations for these books as well as for their own sake, are most effective in visualizing conditions as they were in other days.

Canada has been fortunate in having good artists to immortalize many of the periods in her history, Paul Kane (1810-1871) painted a series of pictures descriptive of Indian life from Coast to Coast, while his contemporary, Cornelius Krieghoff, who came to Canada a finished European artist, concentrated his attention particularly on the scenes and customs typical of French Canadian life.

In the year following the completion of the Canadian Pacific Railway, there came to Canada an English artist, Edward Roper, who made a leisurely trip from Quebec to Victoria. He had travelled extensively in all parts of the world and was therefore competent to judge Canada's merits in comparison with other countries. He painted many pictures during this trip, and later published a book, "By Track and Trail Through Canada," which must have proved very useful to English people considering the Dominion as a new home.

The Public Archives of Canada at Ottawa are very fortunate to have in their possession about twenty-five large pictures with which Roper illustrated the account of his journey. Some years ago, Dr. A. G. Doughty, Dominion Archivist, now Sir Arthur Doughty—happened to recognize one of these Canadian scenes in an obscure corner of a second hand store in London, England. On inquiry he found that there were also a number of other paintings in the same series stored away upon the top floor. Here they were, unframed, dirty and dusty, and in a deplorable condition. On his return from Canada, Roper had evidently had an exhibition of these pictures in London as their catalogue numbers were still attached.

Dr. Doughty recognized their historical value, purchased them very cheaply, and brought them to Canada. Here an artist cleaned them, repaired the parts that had been damaged, and varnished them. Then they were mounted and suitably framed and to-day they hang in all their fresh beauty in Canada's Public Archives where they are prized and admired after so many years of unappreciated oblivion.

Roper had visited the United States and Eastern Canada on other occasions, but on this trip he looked forward to seeing the great Canadian West for the first time. Kane's pictures had portrayed Indian life in Western Canada before there was any considerable white settlement. With the Canadian Pacific Railway had come the vanguard of agriculturists, and Roper's book and pictures give us an intimate glimpse at this transitional period.

While Roper was staying with some friends at Broadview, North West Territories, he visited The Crooked Lakes Indian Reserve. They were riding along the Qu'Appelle Valley one day when they met a party of Shark Indians who were just moving their camp to a knoll on which some teepees were already erected. Having no moving equipment such as we are accustomed to, they followed the customs of their forefathers. Crossing their teepee poles over the horse's back so as to leave the ends trailing on the ground, they fastened their teepee cover across these trailing ends and tied on whatever household equipment they had to move. Roper painted these "Indians On The Trail" with characteristic fidelity. The women are trudging along heavily loaded, the children are carrying all they are able to, while even the dogs must help. One of them is pulling a small travois; another has a pack on its back. But in the midst of all this toil, the brave rides serenely along, quite unconscious that there is such a thing as labour in the world.

It is interesting to compare this picture with another entitled "A Red River Cart at Calgary", North West Territories.



A ranch in the Foothills of the Rockies.



Mount Cheops from Glacier House in the Selkirks.



Farming in Manitoba in the Eighties.

While Roper was sight-seeing in that city of the foot-hills, he saw down near the Bow River a so-called civilized Indian dressed in the conventional garb of the white man. He led an ox harnessed to a Red River cart in which rode his wife and child. In the foreground an Indian and his squaw in picturesque native costume look disdainfully at their fellow tribesmen whose habits have been changed so superficially by the advancing tide of civilization.

Roper was very much interested in gathering first hand information relating to the agricultural possibilities of the Canadian prairie land. His picture, "A Settler's Home near Carberry, Assiniboia", is quite typical of frontier life at that time. There is an atmosphere of happiness and satisfaction which comes at the close of a day's work well done. All attention is fixed on the farmer as his wife and children come out to greet him. Even the pigs, chickens, cows and dog are adding their notes of welcome. The dwelling is a typical log house with sod roof which in summer blooms into a lovely garden while a dug-out in the side of a knoll takes the place of a barn.

Roper was a keen amateur naturalist and wherever he went he took pleasure in examining the fauna and flora of the district. He pressed flowers and made collections of butterflies, beetles and moths to take back with him to England. He loved the beautiful flowers which carpeted the prairie in mid-summer and often painted them in the foregrounds of his pictures. In "Some Prairie Flowers and a Prairie Dog", however, he made them the central theme. This striking picture has been temporarily loaned to the Canadian Embassy at Washington.

Paul Kane's purpose in making his long trek across the continent was to paint the Indians and scenery of Western Canada. Whether it was his trying experiences en route which cooled his ardour, his chief interest always seemed to be the Indians, while the superb mountain scenery provided merely a suitable background for his aborigines. Roper, on the other hand, was particularly interested in the mountains. The composition of his picture is well arranged,—impressive mountains often snow-capped, dominate the background to which converge lower slopes covered with foliage. The foreground usually comprises considerable detail,—trees take on their individual characteristics, a small

mountain stream bubbles over the boulders, a lake nestles in a natural basin, or along the Pacific Coast one looks across large expanses of water to the hazy mountains in the distance. We are accustomed to seeing these details in all mountain pictures, Roper, however, loved life and activity and almost invariably added other details to his foregrounds which we soon come to recognize as his individual characteristic.

In a picture of the Van Horne Range a couple of bears fit suitably into the landscape, as well as a group of mountain sheep in "The Glacier and Mt. Sir Donald". But Roper sometimes painted people in the foreground who appear somewhat incongruous, such as the woman holding an umbrella in the path at the centre foreground of "Victoria, B.C." From an aesthetic point of view we wish such figures were not there; they take our attention from the main theme and focus it on unimportant details. But from an historical point of view they are a quaint study of the period in which they were painted and are therefore of exceptional value in showing the progress of our national life.

What a change has come over Western Canada since Roper visited it less than fifty years ago! Winnipeg was just emerging from its first real estate boom, and even then there was intense excitement over the prospect of buying and selling property at huge profits. Vancouver, only a year old, was also bustling with feverish business activity and was becoming conscious of its important destiny in Canadian affairs. Here they were also in the throes of a real estate boom and super salesmen were ever on the look-out for gullible investors, especially Englishmen with money. Victoria, with its characteristic English atmosphere, appears to have been the same charming place on a small scale that it is to-day. Much of Western Canada, far and wide, had still its history to make, nay even to begin.

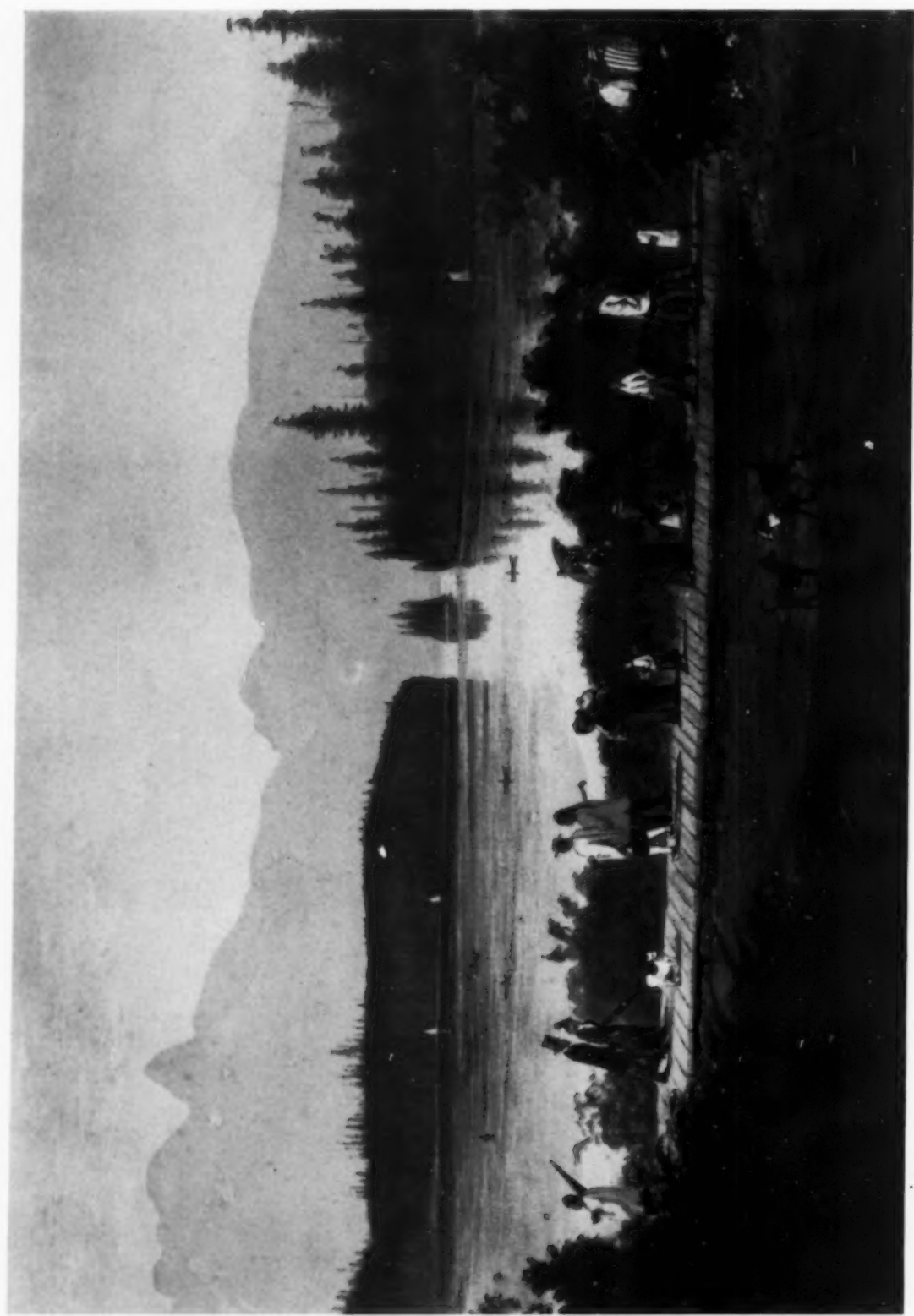
In the mountains Roper was particularly delighted with Field and Glacier which he considered were naturally adapted to become the most popular mountain resorts of the North American continent. But in order to make them rivals of the famous hotels in the Swiss Alps, he thought their accommodation should be improved by the addition of sitting rooms with comfortable furniture and by shoe-shining facilities, a service so necessary to the happiness and peace of mind of the average Englishman.



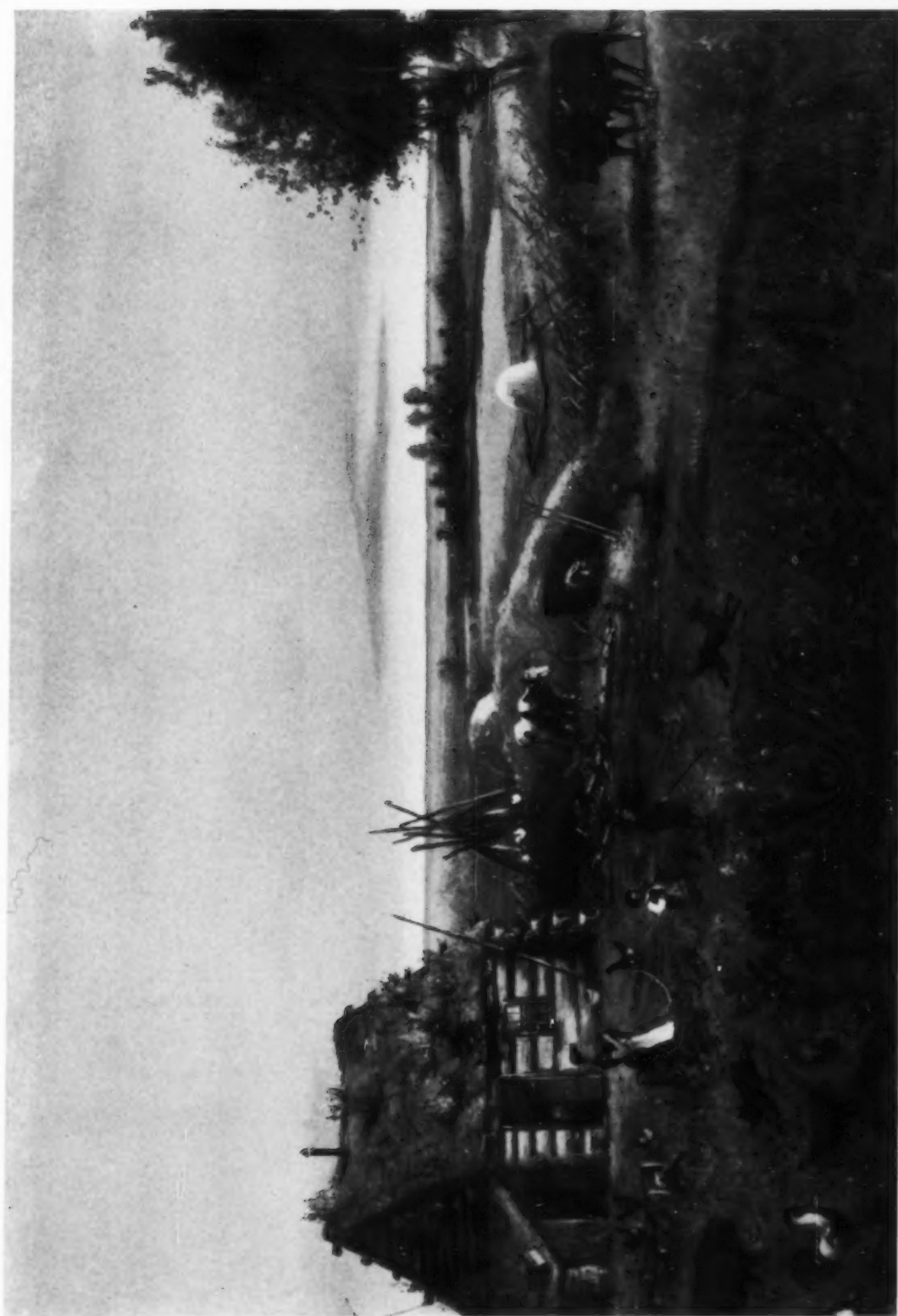
On the Crooked Lake, Moran Reserve, North West Territories.



The Valley of the Kicking Horse, and to Van Horne Range, in the Canadian Rockies.



New Westminster, British Columbia—"I was seated by a road-side, amongst ferns and rose-bushes, making a sketch up the river, and was much amused with this strange diversity of people who passed by."



A Settler's Home near Carberry, Assiniboia, in 1880.



Looking across Deadman's Island to Victoria, British Columbia.



A band of Indians in the Qui Appelle Valley.



Late in the summer you will find the fleshy fruiting frond of the Ternate Grape Fern. Botrychium obliquum, in open damp meadows, perhaps sheltering in the lee of a rock.

FERNS IN CANADA

by GRACE FRASER MALKIN

With illustrations from photographs by BRUCE METCALFE

IN sheer delicacy and purity of form no plant rivals the fern. Thoreau said, "Nature made ferns for pure leaves to show what she could do in that line." And as our eyes follow the gently moving lace-like fronds, whether by the roadside, edging the meadow, or down dim forest aisles, we cannot help but agree.

Few people are insensitive to ferns. Witness the great increase in fern culture, in house, conservatory, rockery, and garden. Motoring has brought their sylvan solitudes within reach of us all. By fern-circled pools and jewelled water-falls, along meandering creeks where the Cinnamon and Interrupted ferns lift high their crowns of fronds, we find the casual picnic party. Few among them will fail to appreciate the ferns' contribution in grace and beauty to their enjoyment. Yet only one, here and there, will know the ferns. And to know intimately any page of Nature's book opens a long vista of treasured hours and days which no one can take from us. Learning to recognize ferns will take us to the loveliest spots in Canada, green unspoiled retreats of peace.

As our canoe noses along the shore of the lake in the spring, we'll undoubtedly see the unfolding crosiers of the Ostrich Fern. Nature has designed fern buds in the spiral. When we see this form we know that the plant belongs to the fern family. "Fiddleheads," we call these unfolding fronds, from their resemblance to the curve of a violin. No form could be more gracious than the uncoiling blade of the Ostrich Fern, perfect in symmetry. In the summer when the plant has reached maturity, the fronds reach a height of from three to seven feet. Great colonies of plants grow in open, partially cleared spots near the shore. But what is that curious green spike rising from the heart of the cluster? In shape it is not unlike an ostrich feather. That is the fertile fronds which mature in mid-summer. On it, the leaflets or pinnae, are modified to bear the spores. To the naked eye the resemblance to an ordinary frond is not

apparent, but under a microscope it may be clearly seen.

A low wet meadow slopes down to the shore of the bay, and here the Sensitive Fern runs riot. The crosier is tawny pink in colour, and often the plants are so numerous that they lend a soft pink bloom to the field. When the frond uncoils it is broad and coarse, unlike the common conception of a fern leaf. In height it reaches from one to two feet. During July the fertile fronds appear. These are stiff and straight with the modified pinules which bear the spores strung along the stem like little green berries. As in the Ostrich Fern, the fertile fronds remain standing, sere and black, for two or even three years. This fern is one of the first to be touched by Autumn frosts which may account for its name.

Now let us follow the swollen creek as it meanders through a boggy half-shaded swamp. Here, rising out of every cushioned hummock of emerald moss, are the silvery-white crosiers of the Cinnamon Fern. On closer inspection we note that each unfolding frond is well wrapped in wool. Later in the year this silvery wool turns a beautiful tawny brown, clinging to the plant at the bases of the pinules and along the stipe.

When the Cinnamon Fern is in fruit it is a regal plant. The fertile fronds rise, spear-like, from the heart of the vase formed by the leaves. They are a gorgeous cinnamon brown, lending the plant its name. Later in the year, if we have trouble in distinguishing the Cinnamon from the Ostrich Fern, these faded fertile fronds lying limply on the ground beneath, will give us a clue.

During the summer the creek banks will be clothed with the light green draperies of the Royal Fern. Outlined against masses of waving feathery grass, it makes a beautiful picture. To many, the Royal is known as the "Flowering Fern" because the fertile fronds are leaf-like below, and are tipped above with



flower-like fruiting clusters, pale reddish-buff in colour.

At the edge of the meadows, thrown into relief by the trunks of the black alders, thrives the Interrupted Fern. From the low lying circle of sterile fronds, spring the taller, more erect fertile fronds, giving the plant its characteristic two-tier outline. These fertile fronds are extremely curious. Leaf-like below, and leaf-like above, in the middle the pinnules are contracted or "interrupted" to bear fruit. At first they are very dark, almost black; later a golden green; and brown during the rest of the summer. They identify the plant absolutely.

The so-called "flowering ferns," the Cinnamon, the Royal, and the Interrupted, thrive admirably in a corner of the garden. All they ask is good rich loam and a little shade. In beauty they will amply repay the slight trouble caused us in bringing them from their haunts.

Coming out of the creek into the lake again we pass the formidable face of "Big Rock." In early days it was topped by tall white pines, but they have since given way before the lumberman's axe. Here "the cheerful community of the Polypody" has done its best to repair the ravages made on beauty's face. Springing from every tiny crevice, carpeting the tallest ledges of rock, its shining evergreen plumes wave gayly in the breeze. Turn over one blade and we'll find two rows of conspicuous round spore-cases, looking like little buttons.

Many times we pass Big Rock before we discover that those rusty little patches, outcropping here and there, are indeed another species of fern. How could a fern live on the most exposed part of the cliff in the face of the blazing sun? No shade, no moisture, no protection of any kind! But the rusty *Woodsia* thrives there. When we examine the diminutive fronds, not more than five inches in length, we find them covered with a thick coat of wool on the under surface. This wool prevents excessive evaporation of moisture as it covers the breathing pores situated on the under side of the leaf. So thick is the wool that we must search carefully to see the round spore-cases borne on the margins of the fronds. At maturity the wool turns a rusty brown, giving the plant its name. One curious feature of the Rusty *Woodsia* is the mass of coarse brown bristles among the mats of plants. We

discover that the stems are jointed about an inch above the root-stalk and remain as stubble after the fronds die.

Let us beach the canoe where the concession runs into the lake and climb the hill to the Maple Woods. Bubbling springs make the hillside moist and we must watch our footing. In these small woods where the soil is enriched by many seasons of rotting leaves, we'll find a clump of that queen of ferns, the Maidenhair. Lying half in and half out of the shade, its graceful whorled fronds invite closer inspection. We admire the lacquered thread-like stalks, whose blackness forms such a contrast to the tender green of the pinnules. In beauty, in delicacy, in grace, this fern commands our instant admiration.

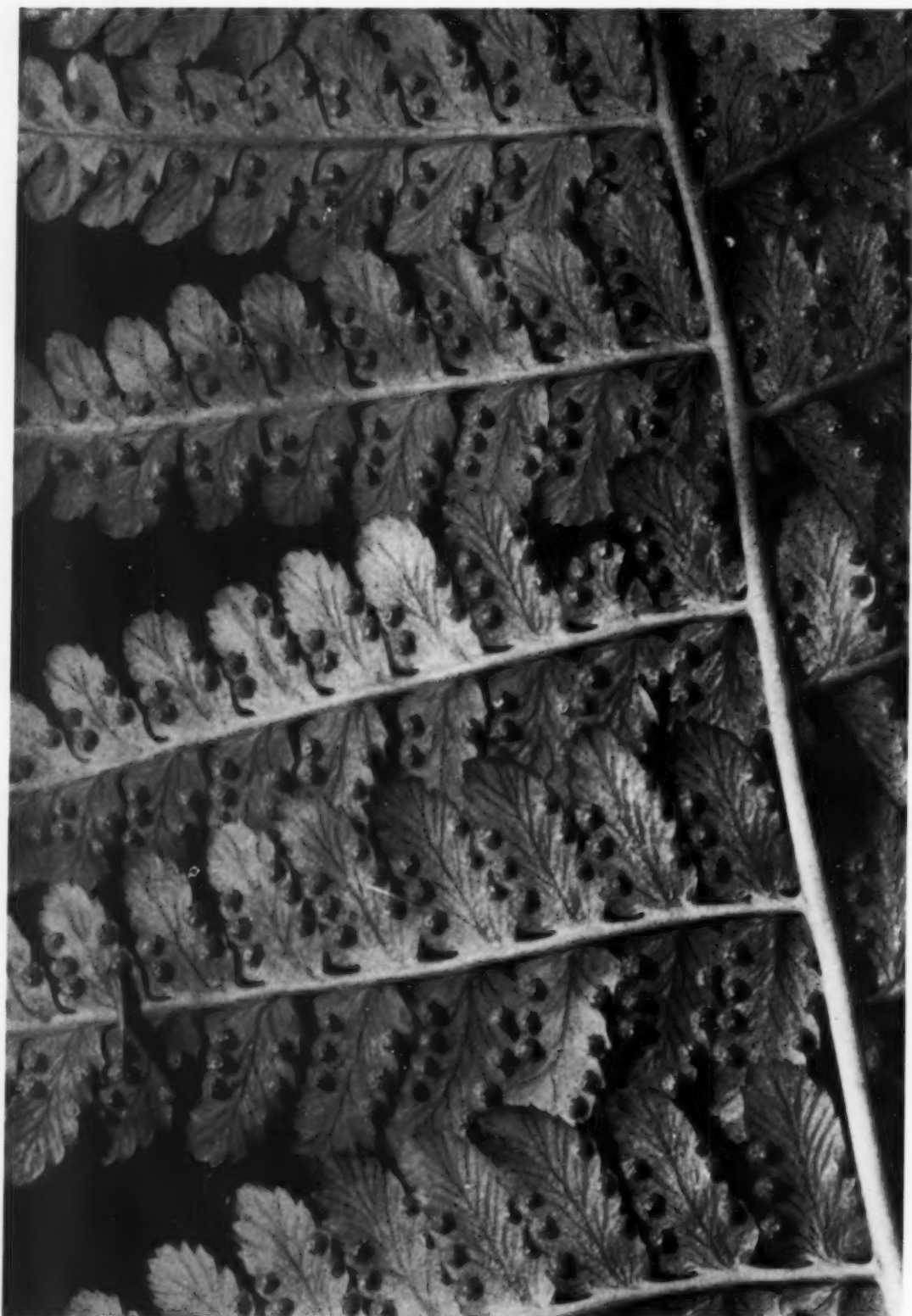
While stooping to climb under the fence we see a new fern whose triangular fronds are yellowish-green in colour. After the fragile Maidenhair they look rough and coarse. Nevertheless the little fern is pleasing. The two lowest pinnules fly upward to greet us. This characteristic is peculiar to the plant and renders it easy to identify. It is the Long Beech Fern; "long" because the triangle formed by the frond is longer than it is broad.

Nestling at the root of an old maple stump, fraternizing with Canada Mayflower, Violets, and Starflower, is the dainty Oak Fern. A tiny fern with a blade like three fronds in one. It is seldom more than fifteen inches in height. If we remember "three-in-one" we cannot mistake this fern. Even the uncoiling fronds carry out this idea, for the three miniature green balls on their thread-like stalks, are "an exact replica of the conventional sign of the pawnbroker."

Farther on a glossy colony of Christmas Fern grows between two fallen birch logs. We know it well. Since childhood we've seen the burnished dark green fronds in florists' windows. It is an evergreen fern. In the spring the brown-scaled crosiers peer out from among last year's leaves still fresh and green. Perhaps for this reason the Christmas Fern best exemplifies the spirit of our Canadian woods, strong, bold, and fearless.

Among the fronds we notice some that are taller and noticeably contracted towards the tip. These are the fertile fronds bearing the round closely packed fruit-dots.

Close to the Christmas Fern grows another favourite of the florist, the Com-



The Marginal Shield Fern, Thelypteris marginalis—The fruit-dots of the Marginal Shield Fern grow in straight ranks close to the margin of the pinnules. They make the plant easy to identify.

mon Wood Fern. It also is an evergreen. The beautiful lacy fronds grow in graciously curving circles from two to three feet high. Here is a perfect specimen springing from the top of an old decayed stump. We can plainly see the small round fruit-dots underneath the fronds.

At our feet is a plant that we might easily mistake for a flowering plant. The leaves branch out half-way up the stem. They are in three main divisions, cut again into many smaller segments, giving the plant an open lace-like effect. The fertile portion resembles the unfolding buds of a flower. But on looking more closely we see the contracted pinnae bearing the spores, as we came to know them in the Royal, Cinnamon, and Interrupted ferns.

The root of this fern was used by our North American Indians as a remedy for snake bite. A portion of the fresh root was mashed up and applied like a poultice to the bite. Perhaps that is how the plant earned its name, Rattlesnake Fern. "If a snake got into the wigwam a decoction of this root was sprinkled around and the snake did not return."

In the heart of the woods, above the black leaf mould, rise the graceful blue-green crowns of the Marginal Shield Fern. When we look at its fruit-dots we cannot mistake it. They are borne in straight rows close to the margin.

We read that—"It comes closer to being a Tree Fern than any other of our species, the caudex, covered by the bases of the fronds of previous seasons, sometimes resting on bare rocks for four or five inches without roots or fronds." A Tree Fern prostrate!

Coming out of the Maple Woods we descend a rocky hillside, waist deep in bracken. Here and there clumps of stag-horn sumac lift their red brown cones. After the twilight of the Maple Woods full sunlight is blinding and we sit down on a flat-topped rock for a moment. And there, close beside us, almost touching the rock, is a fleshy fern with a fruiting portion as tightly packed as a cluster of grapes. It looks top heavy. We feel the slightest push would send it over. This is the Ternate Grape Fern, the last to appear and fruit of all our species.

Now we go down the hillside, through the meadow, back to the canoe. Only a short distance, yet we meet two more ferns. The meadow edge is rimmed by the yellow-green fronds of the New York

Fern. They all face outwards toward the light. We pluck one. It is very delicate and breaks easily. We notice that it tapers toward each end, at the base the pinnae being reduced to two tiny ears. Crush the frond in the hand and it gives out a pungent rather pleasant fragrance. This is due to many minute glands on the under surface of the leaves.

Growing in the open at the edge of the old draw road, is a light green clump of delicate lacy ferns. Can they be the New York grown taller and statelier? No — the fronds are three times as long, they don't taper at the base, and — we turn one over — the spore-cases are held in place by a turned-in tooth of one segment of the pinnules. Look for that "reflected" tooth if you are in doubt about the Hay Scented Fern. To enjoy the fullness of Autumn the tang of this fern should greet our nostrils. No words can convey its message, the wavering flight of falling leaf, the whirl of partridge wings, all the mellowness and ripe fulfilment of the dying year are in it.

The sun is dropping low on the horizon, but before we go home we must visit the limestone rocks at the foot of the lake. Fortunate is he who lives in country where outcroppings of both granite and limestone occur, as on the Manitoulin. Several of our most interesting ferns prefer, in fact almost demand, limestone for growth.

Our daintiest fern, the diminutive Maidenhair Spleenwort, throws out its exquisite rosettes from the clefts of shaded cliffs. The stipe and rachis are dark shining brown. Against the gray cliff, the glossy stems and green pinnules stand out in cameo relief and we are lost in admiration. Out comes a trowel and one plant goes home to be treasured in the winter bowl garden. From experience we know that it thrives there to perfection.

Nearby we notice the Green Spleenwort, first cousin to the Maidenhair. It grows in dense mats in shady moist situations. The stems are green and the whole plant is thinner and more tender in appearance than the Maidenhair.

Follow a path down a mossy shaded hollow and we'll come to a huge boulder. Look up and there are the thread-like tips of the Walking Fern peering over the top. With considerable effort we scale the summit and find there a large circular tuft of this curious plant. The leaves are heart-shaped at the base, flowing out to a

needle-like point. From tip to base they may measure fourteen inches, although the eye will scarcely credit this. The plant roots at the tip of each frond, and as the connection between the parent plant and the new child is slow to die, three or four generations may often be seen "walking" in Indian file.

We leave the hollow and emerge into brilliant sunlight again. Here the Purple Cliffbrake throws purplish-blue shadows on the almost chalk-white surface of the cliff. It springs out of the crevices quite indifferent to blazing sun and lack of moisture. Its leathery leaves are ever-

green with the spores hidden under their recurved margins. Too often the Purple Cliffbrake delights in inaccessible locations. We gaze upwards, someone half-heartedly suggests a climb — but the call of home and dinner proves too strong. Another day . . .

That is the lure in outdoor quests. Always another day, more delightful, more unexpectedly rich in treasure than the last. We realize anew the truth of Van Dyke's saying —

"We measure success by accumulation. The measure is false. The true measure is appreciation. He who loves most has most."



*Left: This bowl contains
a plant of Maidenhair
Spleenwort, Partridge
berry vine, Gold thread,
Bulblet Bladder Fern,
and Hepaticas.*

*A clump of the well
wrapped croziers of the
Cinnamon Fern,
Osmunda cinnamomea.*





The berry-like fruiting frond of Onoclea sensibilis, the Sensitive Fern.



Our North American Indians used the crushed root of the Rattlesnake Fern, Botrychium virginianum, as a poultice to apply to snake bites.



The Cinnamon Fern, Osmunda cinnamomea, throws out a graceful circle of fronds. From the heart of the cluster rise the spear-like fruiting fronds, cinnamon-brown in colour.



On the face of tall cliffs, in the blazing sun, thrives the Purple cliffbrake, Pellaea glabella.



By the roadsides, and edging the meadows, the New York Fern, Thelypteris noveboracensis, turns to face the light.



The Christmas Fern, Polystichum acrostichoides, is beloved by all. Its glossy fronds are evergreen.



Grace F. Malkin

The Long Beech Fern, Thelypteris phegopteris is readily identified by the upward spring of its two lower pinnules.



The diminutive Oak Fern, Thelypteris Dryopteris has a blade-like "three fronds in one".



*A whiff of the Hay Scented Fern, *Dennstaedtia punctilobula*, brings an image of autumn.
The scent is very pungent and aromatic.*



*Along the river, the Ostrich Fern, *Pteritis nodulosa* throws up magnificent crowns of fronds.*



"The cheerful community of the Polypody", *Polypodium virginianum*. Notice the conspicuous round spore-cases on the backs of some of the fronds.



The common Wood Fern, Thelypteris spinulosa, variety intermedia. The lace-like fronds of this fern are conspicuous in rich woodlands. They often grow in gracefully curving circles.



The Maidenhair Fern, Adiantum pedatum, perhaps the most beautiful of all our ferns. A Queen among ferns.
The Green Spleenwort, Asplenium viride, resembles the Maidenhair, but prefers dense little mats to the rosette.





The Interrupted Fern, Osmunda Claytoniana, loves to grow along the river banks. The curiously contracted pinnae, "interrupting" the symmetry of the fertile fronds, are a positive means of identification.



Back from a trip to "The Banks." This "banker" has a great "fare" of Cod. Armorth, Nova Scotia.

SAILING IN A COASTWISE KETCH

by BONNYCASTLE DALE, Jr.

THE myriad seal herds had come out of the North on the great icefields, giving birth to half a million "whitecoats"; the gigantic icebergs had crashed along after them. At night the winnowing wings of countless flocks of migrating birds filled the darkness with a living whisper — the summer urge for the sea was with us once again. So we launched the "Eider Duck", a ketch (a two-sticker) and with Onsi-phorus Bobbet as Captain, Laddie as crew and mate, myself as supercargo, off we set on our ocean wanderings — hoping for "Belle Isle, Labrador, and the North". From the top of the Bay of Fundy we set sail Yarmouthwards.

Grand Pré, at the mouth of the Gaspereau river, the scene in those distressful days of nearly two hundred years ago of the expulsion of the Acadians, attracted our attention the first day afloat. We landed and wandered about the tiny village; there stood the Memorial Church, the ancient well of the Acadians, the statue of Evangeline. To-day there is a plan afoot to bring back a trainload of the "Caguns", the descendants of the Acadians from far off Florida for a grand reunion. Far spreading, prairie-like marsh meadows stretch along the shores of the Minas Basin hereabout, whence the name Grand Pré, meaning Grand Prairie. The Gaspereau was glittering with the myriads of pound-weight fish, gaspereau or alewives, then ascending to the upper reaches of the stream, and the lakes, where they would spawn, and boys and men of the village were actively engaged in dipnetting them as they swarmed in schools up past the falls and rapid channels.

"Any salmon come into this stream?" I asked a venerable old Acadian as, sitting in his scow moored to the bank, he swept up and down his great scoop net. "Well!" he answered, hesitatingly, then in a whisper, "My boy has got rheumatism bad from wadin' the stream o'nights!" The wretch, sweeping the river for salmon with an unlawful net!

The ketch tacked and pointed up admirably, fighting her way out of the Basin against a stiff nor'wester, out around

majestic Blomidon, past Cape Split and through the Minas Channel to Fundy proper. "She sails like a witch!" Phorus bawled. The tide was ebbing, near slack, and wharves stood high above the sea now that nearly fifty feet of Bay of Fundy tide had receded, leaving groups of great black slimy piles of the wharves in the coves and harbours along this bold coastline.

That evening, in the sheltered Annapolis Basin, we spied the Digby Life Saving Station just inside "The Gut" that connects the Basin to Fundy, and we anchored there beside the Lifeboat "Daring". Ashore to limber up, the brave men of the "Daring" told us of many heroic trips into the gales of Fundy in daylight and darkness to rescue helpless fishermen adrift in their broken-down motorboats, not one left unsought, even though "The Bay" is a black fury at night.

Seeking ballast to replace discharged cargo at Yarmouth the next day, Phorus led me to the the Public Library. "Thar's your ballast!" he boomed with a sly grin. There indeed were two great slabs of rock, of great historical value, apparently, thought to be Runic Stones inscribed by the adventurer—Norsemen who first visited this land of Nova Scotia, then called Markland, about the year 1007. Deciphered by experts, the inscriptions give us the brief message "Harku's son addressed the men". Chuckling over the joke, Phorus assured me no offense was meant. "I've always been a piratical joker," he added.

Out from the busy piers of Yarmouth, down the narrow tide channel amid the low tide mud flats we chugged just as the Boston liner steamed in after a night's voyage from the United States. Clear of the harbour we hoisted sails into a light breeze and set a course for the seagirt islands of Mud and Seal, twenty miles offshore. Anchoring off the rocks at Seal Island, we went ashore in the dory, landing on a set of pole skids which served as the dock — a slip warned me not to step on the globs of gurry (reeking fish livers) that grease the poles to ease the way for large motorboats. A ramble over the part of the

island where sea birds nest was Laddie's immediate thought. Sea Pigeons or Guillemots were nesting among the rocks, and Mother Carey's Chickens, as these fishermen call them, really the Leach Petrel, had their homes in the turf as rabbits might. The soft soils are honey-combed with their burrows, and back in the end of the musky-smelling tunnel sits the bird incubating its single white egg. Only at night do they come out, these nesting petrels, being relieved then by the mate who had fed all day at sea. With a lucky "snap shot" of eight sea pigeons resting on a rock, we left them all to their solitude.

Late in the day we passed the scene of the most tragic sea disaster in these parts of the Atlantic,—the wreck of the liner *Hungarian* with the loss of 450 souls almost a century ago. I saw Phorus snatch off his battered sou'wester as he stood at the wheel, and stand with bared, bowed head. Fourteen days out from Liverpool, the palatial liner had run into foul weather off the treacherous Cape Sable, unguarded at that time by either lighthouse or fog whistle or "groaner bouy", as it now is, and had grounded on the inner ledges during that wild storm, the entire list of passengers and crew perishing, many of them dropping off the masts in sight of the few helpless watchers on the lonely sandbeaches.

As we neared Cape Sable the distant fog banks vanished, giving us vision for many miles. We could now discern the long low sand hills and beaches of Cape Sable, with the new hundred foot lighthouse that now stands guard with its ally, the fog whistle, on an out-jutting tip. Fifteen years ago we saw these hills as twenty foot dunes covered with coarse spear grass, but now they are almost blown away. Undoubtedly these are the sandhills the Norsemen wrote of so long ago.

Dense fog held us in port at Cape Sable Island for several days. The shore fishermen however, worked on as usual, bringing in boatloads of cod and haddock, herring, mackerel, and pollack; loads of salt arrived from far off Turk's Island for use in curing the fish. A medley of boats gathered at the wharves after each tide—here was a catch of halibut, a valuable load; another boat had cod—I pictured a specimen amongst the catch. Fishermen worked busily atop great fish cars floating

beside the wharves, dressing and splitting the fish. During the sunny, drying hours wide-spread flakes held thousands of split, salted fish, drying before storage and shipment.

Safely through Barrington Passage, we found ourselves in Barrington Bay, abreast of more historic lands. Near the Sand Hills, now Sevim beach, a summer resort, bits of coloured glass are to be found, relics that tell of a forgotten church. Eastward around Baccaro Point lies Port La Tour, where we anchored for a visit. A young guide took us to the remains of the fort of those momentous days of 1627. Only grassy mounds now mark the site of the historic stronghold, Fort St. Louis, from which the indomitable Charles De La Tour fought his valorous battles. And of that illustrious man, La Tour, there is not a sole descendant to be found, the port alone perpetuating the name.

More reminders of the days of old were presented to us as we coasted eastward—Shelburne, the present town of "Port Razoir" "New Jerusalem" "Port Roseway" as at different times it had been named, and now noted for fine shipbuilding; Lockeport, where once the women of the town, raided by American privateers, scared off the intruders by a brave show of arms composed of a very few weapons and many broomsticks steadily aimed as guns, giving the appearance of a large force of defenders; privateers in Port Mouton, pronounced "Ma-toon", and in other bays all along the coast haunted the sea, raiding or seizing less powerful ships, sailing them back as mighty prizes,—brigs and sloops and ships of war.

Boatloads of tourist deep sea and tuna fishermen sped in and out of the bays on joyous trips, and the sea teemed with the boats of the shore fishing fleet. Ever we dodged the nets of the herring fishermen and, near river mouths, the salmon nets; by night a sharp watch was kept for "drifters" with their long lines of free nets going with the tide. East of Halifax we threaded an unending tangle of islands for a week, before reaching the Strait of Canso, the two mile wide channel separating Cape Breton Island from the Nova Scotia mainland. The centre of the island is a great inland sea, the Bras d'Or Lake (Bradore). We discovered we could enter this "Lake of Gold", by navigating the St. Peters Canal



*These French fishermen live in sea-weed huts beside their great piles of herring.
Split codfish spread to dry on the "Flakes", Hawk Point, Cape Sable Island.*





The Captain of this two-master skilfully sailed through the narrow passage to Bras d'Or Lake.



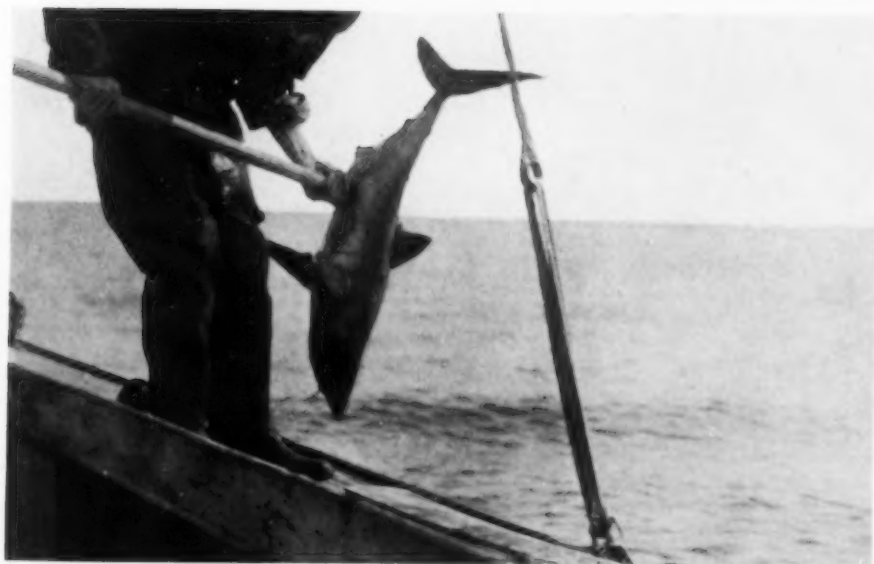
The "Eider Duck" outward bound.



*A medley of
boats of the South
Shore fishing
fleet, just back
from the fishing
"grounds".*



*The lifeboat
"Daring" with
her crew of brave
rescuers. Bay of
Fundy.*



*Laddie and a
hard fighting
"Blue Dog"—a
Mackerel Shark,
the fishermen's
pest.*



The typical fishing cove of Herring Rock, Nova Scotia.



The gaspereau dipper in action with his scroop net.

which connects the open Lennox Passage to the inland lake. This we did, shortly to find ourselves afloat in the fabled lake of beauty. Many another sailing ship followed behind us through this short cut into the Gulf of St. Lawrence.

It was late afternoon when we slipped into the open sea again. A nasty roll hit us broadside as we boldly struck out across Cabot Strait for Newfoundland, a hundred miles away, on a course that once the native Montagnais Indians voyaged in frail canoes on journeys to and from Newfoundland. Cape Breton, then Cape North, the extreme tip of the island, faded from view in the oncoming gloom of dusk.

The breeze freshened with the fall of night, a gusty sou'wester with squalls of warm rain that gave us a rough sea, nearly encompassed by land though the Gulf of St. Lawrence is, making sleep impossible for any of us, and keeping the watch anxiously alert. Our examination of the Tide Tables had mentioned the possibility of icebergs near the Belle Isle region of the Gulf, causing us uneasy thoughts of these dreads to navigation. So when, in the early hours of the morning a rending "B-A-M-M-M! S-U-U-G-G!", a mighty splash and a tremendous jarring heave and lurch threw us clear of the bunks and wheel prone onto the first things we struck, we cried out in alarm "A BERG!" and dashed wildly about, setting our searchlight shining on the surface to locate our danger. As 'Phorus strove at the port bow with a pole, Laddie whirled the flywheel of the kicker, I threw the beam of light bowwards. Immediately a great flume of sparkling sea water flew high, 'Phorus lashed out with the pole—a mighty tail thrashed the air and sea and

disappeared from our sight in the midst of a vivid, gleaming phosphorescent wake.

"A WHALE!" howled 'Phorus. Just then the roar of the engine got us under way in reverse, 'Phorus dashed to the wheel and bawled directions to Laddie. We reefed in the canvas snapping wildly in the half gale, and while the other two sounded the hold and examined the bows below deck, I kept the slowly moving craft on her course to Newfoundland. Now the two figures leaped to the pump and laboured furiously—the worst had happened, we were making water rapidly. With great handfuls of oakum, a long chisel-like caulking iron and a torch, 'Phorus darted below again, and when he returned to relieve Laddie at the pump we were thankful to see that we were more than holding our own.

"Must of bust the timbers apart," 'Phorus reported to me when my trick at the pump arrived. Dawn was due to break soon. Then we would learn of the extent of the damage. Steadily in those dark hours we laboured at the pump to stem the inward flow of the sea.

Hanging from the bow in the first grey light, 'Phorus surveyed our bow. Wrenched right open were the stem and planks, he told us, twisted by the furious heave of the mighty sea mammal as it sought to free itself of the attacker that had cut so deeply into its broad, black hulk. Now we were forced to turn back on our course and return to the harbour of Cape Breton, which we had so recently left, and as the "Eider Duck" swung about, the vision of new salmon streams and great sea trout fishing, the scenes of this rugged north coast, faded from my mind, an adventure for another time.



CHIEFTAINESS—MARY CAPILANO

by NOEL ROBINSON

WHEN the great forests of giant Douglas fir and cedar fringed all of both shores of Burrard Inlet, Vancouver, and before any white man, with the exception of Captain George Vancouver and his men in 1792, had traversed that inlet or trodden those shores, these waters knew the swish of the paddle of Layhulette. In "the years between" the wielder of that paddle has seen a great city of 300,000 inhabitants emerge from the primeval forests. Her life commenced before the great Queen Victoria, whose name is often upon her lips, ascended the throne, and she has lived to hear the tale of the Silver Jubilee of that queen's grandson.

Layhulette is her Indian name, but she is known to the white people as Mrs. Mary Capilano, a chieftainess in her own right, widow of one chief and mother of another, the present Chief Mathias Capilano. This sturdy centenarian lives upon the Capilano Indian Reserve, which faces Stanley Park across the Inlet, and there she still cures her salmon as they hang above a slow smoke fire in a huge hollow cedar stump.

In a long succession of dug-out cedar canoes she has gone a-fishing for those salmon in all weathers. Her tough brown, and still firm, flesh and her rugged body bespeak a life lived in the open air. Her keen eyes look out from among the innumerable wrinkles which weave a network over her finely featured face. And still, despite her great age, she paddles her canoe across to Vancouver at least once a week in the summer time to sell her clams and berries and to visit a few of her pioneer West End white friends, among whom she is always a welcome guest.

Mrs. Capilano's father was half-brother to that Chief Capilano, himself the son of a famous fighting chieftain, who met and welcomed the first white man to enter Burrard Inlet, Captain Vancouver, the great explorer. On her mother's side she is also of royal descent as that mother was the daughter of a chief of the Musqueam tribe, the tribe, the remnants of which are located on what is now known as Point Grey, among whom the intrepid explorer Simon Fraser found himself at the close

of that historic exploration which terminated at the Pacific Ocean.

She was born at what is known as Potlatch Creek, a spot on the shore of the spacious mountain encircled fiord called Howe Sound, situated in the vicinity of Vancouver. This is itself an historic spot for it was so named to commemorate the burying of the hatchet between the warring northern tribes, led by the redoubtable Haidahs, who were the Iroquois of this coast, and the southern tribes. The story of the Great Potlatch is an interesting one as it was told to the writer of this article by Chief Mathias himself, to whom it was passed down by his mother, who had it from her immediate forebears.

"The great chief Paydsmuk, the father of the Chief Capilano, who met Captain Vancouver, knew that the only way to bring about peace was for him to capture the daughter of a rival chief and marry her, to get a wife from among his enemies", explained Chief Mathias. "In the end he did this, the young woman being the daughter of the chief of the Cape Mudge Indians. He took her as his best wife.

"A few moons after that he was at Sechelt, just up the coast from where Vancouver now is, when his enemies descended upon him and took her back, though Paydsmuk escaped. She was tall and slim like the northern Indians. She was taken back to her father at Cape Mudge. But Paydsmuk was determined to recapture his young wife, for he had come to feel very good about her, and he still meant to bring about a good time through her. He had great thoughts as to how he could do this without fighting. So he led a small army of Squamish Indians in war canoes towards Cape Mudge in broad daylight, which was a very unusual thing. Then he sent one of his Indians ahead to the chief of the Cape Mudge Indians with a message of peace.

"The Cape Mudge chief and his braves had a big pow-wow and, in the end, the chief let his daughter, who now had a baby, make the reply to the Squamish Indian messenger. This, too, was very unusual. She said: "I have spoken with my father's people and told them how well



Vancouver Waterfront 1886.

my husband, your chief, and his people have treated me and they say if you will lay down your weapons they will lay down theirs and there shall be peace and our tribe and yours will have a pow-wow". The messenger returned to Paydsmuk and told what his wife had said and the pow-wow was agreed upon.

"All the tribes were tired of fighting, all the tribes in the north and in the south, and they agreed to have a great peace. First a big talk was had at Cape Mudge, with the result that Chief Paydsmuk was given back his wife. Then it was agreed that there should be a great potlatch on Howe Sound. My mother, who was told all about it by her father, says this potlatch was the biggest that was ever held in these parts, and, after it had taken place, the Indians of this coast never fought each other again. And that is why Potlatch Creek was named".

Mary Capilano's earliest memories of the white man go back to when she was a tiny girl, and it is because she can remember the incident about to be related that it is possible to fix her age correctly: Indians are proverbially uncertain of their ages. This incident is indelibly imprinted upon her memory, young though she was at the time, and she has frequently recalled the circumstances to the writer.

"One day my mother and father take me with them in the canoe long, long way up to the Fraser River to the place where the white men have their camp", she said. "Old Mary very little girl then, only so high. My people never see white man before and when they get near they paddle very, very slow. My father say to me 'You lie down flat in bottom of canoe'. He quite bit frightened I think. But he paddle on and we get out of canoe on beach by white man's lodge" (i.e. fort) "Then men with big black whiskers on face come to us and make much pow-wow with my father, but he no understand. Then they take us in tyee (big) lodge and show plenty fine blanket. We not stay long. One Skookum man he laugh and give us blanket and much tobac and my father give him coon and other skins. One white man he pat my head and lift me up and frighten me and I cry. We not stay long. Old Mary never go there again".

This must have been one of the first trading transactions between the white men and the Squamish Indians. It is remarkable that, nearly one hundred years

after the incident took place, there should be an Indian alive old enough to recall the circumstances.

Chief Joe Capilano, Mrs. Capilano's husband, died 25 years ago. Like his widow he was an Indian out of the common, and, like his son, the present chief, he often spoke in public, occasionally addressing the children at one or other of the public schools. Mrs. Capilano recalls the occasion when her husband headed a deputation of three Indian chiefs who presented a petition concerning certain Indian grievances to King Edward at Buckingham Palace. That was the high light of Chief Joe's life. The Mohawk poetess, the late Pauline Johnson, was in London at the time of the visit, giving recitals from her poems, and she foregathered with the three Indian chiefs and acted as their youthful cicerone in the great city which was so strange to them, but which had become more or less familiar to her.

"My husban', Chief Joe, he have much good time when he visit King Edward and Queen", recalled Mrs. Capilano. "He never forget it an' he never forget Buckin'am Palace. The King he tell Chief Joe that he and the queen an' the Big Queen Victoria, his mother, think lots of the Indians. Chief Joe very pleased. He wear his buckskin coat, the same coat my son Mathias wear when he go to meet King George at the big potlatch in the great city" (the Coronation).

Apropos of this brief association with royalty, it is interesting to recall that a few years ago, while Chief Mathias was away from home for the day, his home on the reserve was completely destroyed by fire. The fire was very rapid in its work and those of the family in the house barely escaped with their lives. His mother was asleep upstairs at the time and had a particularly narrow escape. Only three articles were saved from the flames and the old lady herself saved these. They were the picture of Queen Victoria and two framed, autographed photographs of King Edward and Queen Alexandra, which had been given to Chief Joe when he visited Buckingham Palace. Despite the danger in which she found herself Mrs. Capilano would insist on tearing these from the wall where they were hanging.

When Chief Joe died it was felt only right that a substantial memorial should be erected to his memory, for he had been



Mrs. Capilano in stern of canoe, Chief Mathias standing. This dug-out cedar canoe is between 50 and 60 years old. Prospect Point in the background.

Mrs Capilano in her canoe.



esteemed by Indians and whites alike. Thousands of dollars were raised by the Indian population of British Columbia and added to by The Department of Indian Affairs and this permanent reminder of the late chief stands on a knoll in the little Indian cemetery overlooking the sea. It is constructed of granite mined on Texada Island near at hand, is lined with Carrara marble, and inside, in bas-relief, is seen, above the spot where the body lies, a marble representation of the hands of King Edward and Chief Joe clasped, together with lengthy inscription recording the late chief's public work and paying a tribute to his memory.

Mathias succeeded to the chieftainship in the year that King George ascended the throne and he was invited to attend the coronation ceremonies. A few days before the coronation he was received in audience at Buckingham Palace by King George and Queen Mary. Following this the chief spent a never-to-be-forgotten two weeks in London, an outstanding feature of which, in his estimation, was his visit to Madame Tussaud's Waxworks. While in London he paid a visit to the Colonial Office and had a conversation with Mr. Winston Churchill, the then Colonial Secretary. "He was to me", Mathias recalled "a very fine gentleman. He had a long pow-wow with me and I found that he knew a lot about our Indians and about Canada. He said to me to come back to England later, if my Indians could raise the money, and stay in London and find out all about English law and then he said I would be very valuable to my people and understand all about the law for them". Evidently the brilliant English statesman was impressed with the intelligence of the bright young Indian chief.

Chief Mathias is a chip of the old block, possesses a keen sense of humour, and takes his self-imposed duties of chieftainship seriously. He has staged many Indian entertainments of a picturesque nature. He is an eloquent public speaker, a professional dancer in Indian costume, a first-class horseman and a good carver in wood to his own designs. He is equally at home carving a totem-pole, of which he has made several of great size, making bows and arrows from yew wood, fashioning a dug-out canoe, or constructing an Indian lodge. He has just recently completed a small Indian Lodge on the reserve. This is topped by an elaborate piece of carving

representing a thunderbird astride a whale, a design which was included in the handsome silver bowl, filled with gold nuggets, which British Columbia sent to King George as a Silver Jubilee present. Quite recently he was commissioned by the Vancouver Park Commissioners to erect, with the aid of his Indians, a lodge in Stanley Park, which it is hoped will be ready for the commemorations which are to be held this summer in connection with the Jubilee of the city. His eldest son, a finely set up fifteen-year-old lad named Buffalo, who will be the next chief, is showing great promise along the lines laid out by his father. This boy is the apple of his grandmother's eye.

The most valuable contribution towards the amelioration of the conditions of the British Columbia Indians is seen in the encouragement given in some of their large schools, which are chiefly run by religious organizations, to the acquisition of knowledge in agriculture and craftsmanship. But, in the matter of the making of baskets, constructed chiefly from cedar fibre, and often of such fine mesh that the baskets will hold water, the Indians, especially those of the West Coast of Vancouver Island, have nothing to learn and much that they could teach the whites. Mrs. Capilano still makes mats of the most durable quality, in which she embodies coloured patterns designed by her son.

Many photographs have been taken of the old lady, and she appears also in a number of paintings in oils and water-colours, the best being a fine oil painting by the late Miss Margaret Wake, a descendant of Hereward-the-Wake, which hangs on a wall of the City Museum among other pictures of oldtime notables and scenes. Apropos of the photographs of herself, Mrs. Capilano observed one day, laughing, "When Old Mary pretty girl no pictures taken of her—now she very old face all lined up everyone do this", and she imitated a person taking a photograph.

This old chieftainess, whose memories go back to the time when there were no white people in British Columbia, with the exception of the few men at Fort Langley, possesses a vivid personality and a keen sense of humour. She also retains despite her 100 years, at least a third of her original teeth. In conversation she is most entertaining and invariably illustrates her talk by expressive motions with her hands and the long drawn out inflexions she lays on



CHIEF MATHIAS CAPILANO

son of the subject of this sketch, attired in the Indian costume which he wore when he went to King George's Coronation and which his father wore when he visited King Edward VII at Buckingham Palace. Prospect Point in the background.

some of her words, particularly the Chinook jargon words she uses. One day she regarded a huge building being erected on one of the city streets and remarked, laconically, "Skookum shack".

Although many Indians in British Columbia have adopted the Protestant or Catholic faiths, many others may best be described as pantheistic in their belief. Mrs. Capilano and her son are in the latter

class. Upon one occasion the writer asked her what her religion was and, her eyes taking on a far-away look, she said very slowly and impressively "Old Mary no religion". Then, pointing to the ruins of a church which had been built on the reserve by her late husband, she added "One Sagalee Tyee (God)—many church".

And on that note we will leave her.



MRS MARY CAPILANO

daughter of one Indian Chief, widow of another, and mother of the present chief—as this centenarian looks to-day.



Ponte del Reato.



Il Moto from Grand Canal.

VENICE—QUEEN OF THE ADRIATIC

by W. HARVEY-JELLIE

FAR-REACHING changes, indeed, have swept over the cities of Europe in the last five and twenty years, with the great movements that have followed in the wake of the world war, yet there are still cities and hamlets to be found which carry us back to the charm of the Middle Ages. Thus, from out of the swirling waters of centuries of change, Venice still rises, glorious, majestic, the creation of her own rich historic past, bearing the glamour of bygone greatness, endued with the witchery of her unique charm, still unquestionably 'Queen of the Adriatic'. Year by year the lure of her silent waterways, the haunting memories of her palaces, the splendour of her art draw the ever-growing stream of tourists from east and west to revel in her beauty. They come, urged on by instincts and tastes as varied as human nature; and never yet has the city of the seas failed to gratify and charm. Her days of proud imperial independence are passed—her marvellous commercial supremacy is over—, but still she rises like a magic creation from out of the blue waters, and her power to fascinate is as strong as in the days of her glory—though the secret of her charm eludes all attempt at analysis and we are compelled to sum up all impressions of her wonders in the one word "Venice!"

Nowhere in all the world can roadway be found comparable with the Grand Canal. Like a great winding serpent the

broad waterway winds through the heart of the city from the busy railway station to the wide and wave-washed Guidecca; and from the moment when the traveller steps from the din of the Italian terminus onto the quay, where a hundred gondolas await the call of the visitor, he realizes that he is in a fairy city fit for some creation of Arabian Nights or some magic wand of Kubla Khan. With a swish of the long oar his boat darts away on the quiet waters, leaving the long ripples lapping in music behind him—away under light and graceful bridges, round sharp corners from one canal to another, between palaces and churches in bewildering multitude, past quay-side groups of laughing Venetian girls, dignified matrons and tanned and wrinkled sires, till at some one of the numerous sumptuous hotels he finds himself housed in what was erstwhile the palace of mighty senators or wealthy merchants.

The first leisured moments may well be spent in acquainting oneself with the palaces that line the Grand Canal, full of rich historic memories. They are still known by their honoured names—the Justiani palace, the Vendramin, the Rezonico and a score of magnificent mansions, reared on their thousand piles above the sand banks, waiting gondolas moored at the doors by the gaily painted staffs—all famous for the great and gifted owners in bygone days, and making the broad



Miss E. D. Benson

ONE OF THE NARROWEST CANALS IN VENICE, ITALY
"Note the top of the Campanile in the distance" and the strange
porthole-like windows on the left. The hand rails underneath
are used by the Gondoliers to hold their Gondolas at the canal
side, while passing another craft; they also serve as bumpers where
the canals are so narrow.



Miss E. D. Benson

IN THE HEART OF VENICE

A canal in Venice, Italy, showing one of the typical little bridges in the distance and the tower of the Armenian Church to the right. "The lure of her silent waterways, the haunting memories of her palaces, the splendour of her art draw the ever-growing stream of tourists to revel in her beauty."



Clock Tower in Piazza of St. Mark's.

water-way from the noble bridge of the Rialto to the sea, one vast promenade of wealth and fame and power. As you sweep along the silent path your gondolier will point to palace after palace, naming the famed and great who once dwelt in their halls—don Carlos, Byron, Giordano Bruno, Browning, Goethe, Napoleon, George Eliot, Schiller—names that come in bewildering disorder and amazing frequency, till one begins to realize how Venice has laid her hand upon the mighty genius of humanity and summoned to her court the leaders of art and science, of literature and thought, of parties and of nations. One and all, they felt the lure of her grandeur and came to find in her a refuge, a solace and a home. And where in Europe can one find the like of it—the splendour and the colour under the radiant sun—the witchery of shimmering blue beneath the pale rays of the moon—the mirth and music of the wild and joyous Carnival?

Different are the emotions awakened when we visit the great Square of St. Mark's. Well might Ruskin pour out all the enthusiasm of his heart in the rapturous language in which he describes the first impressions caused by the sudden vision of the famed Church of the Republic. Between the marble palaces of the Procurators—now occupied by the stores and cafés of the city—there opens the broad square. The wide pavement of black and white marble stretches away to the further side where rises the glorious cathedral, with its five domes and its marvellous porches and the great Campanile close at hand. Passing by the three tall pillars of the Republic one is arrested by the rich tracery and wealth of carved figures that cover the five arches of the entrance. And what scenes of historic interest have been transacted here! Beneath these arches did not the proud emperor Barbarossa make his submission to the Supreme Pontiff with the words 'Non tibi sed Petro', only to hear the arrogant response 'Et mihi et Petro'? Beyond the portals comes the wonder of the Church itself, one vast picture gallery of sacred themes all done in priceless mosaics. Walls, ceiling, domes, all have been utilized by artists with the inland fragments of coloured marble to set forth in vivid form the great themes of the sacred Scriptures and the cardinal doctrines of the Christian church. As the Venetian

worshippers sit in the cool silence of the light that streams through richly coloured windows, they see portrayed before them the ideals set forth by Prophets and Apostles and by the great Founder of the Church Himself. Hence, as it has well been said, the sanctuary of St. Mark's is at once a picture gallery and a church, a shrine of the faith and a shrine of sacred art. Many a hundred square feet of these priceless mosaics speak of the long labours of the ancient worker in stones who set forth this glorious blazonry of the Gospel of the Cross to woo to the faith the hearts of the populace. The church is dedicated to St. Mark the evangelist; and the legend runs that the faithful were compelled to rescue his remains from the infidel Turk by stealth, conveying it secretly to the waiting ship and concealing it beneath a cargo of pork to elude the suspicions of their opponents. And it is over his shrine that the devotion of the middle ages reared the vast Byzantine edifice of brick and marble upon the thousand wood piles whose slow and inevitable decay is striking terror into the hearts of architects and procurators and every lover of the treasures of the doomed past. The builders of the water-city built well and lavishly; but none can defy the persistent attacks of cruel time. And that lingering sadness which strikes all visitors to Venice is perhaps at its maximum as we emerge from the reverent and artistic glory of the sacred fane.

Outside the great temple, signs are not wanting of the ceaseless care of skilled officials to combat the incipient decay; but the work is rendered Herculean by the fact that one foot below the level of the gorgeous square the toilers find the water-level. But here we change the atmosphere of religion for that of medieval history. The annals of the city carry us back to the turbulent and uncertain days of the fifth century when the wild inroads of the dread Huns compelled the populace of the northern Italian cities to flee in terror to the sand dunes of the Adriatic and there found their dwellings on the shifting sands, secured by myriad wooden piles deep driven into the shifting soil. There rose the city as if by wizard's wand, on its hundred islands, with its countless canals, spanned by 400 bridges. For fifteen hundred years the great Republic grew in wealth and power until it ruled

the commerce of the world and humbled the warlike pride of Constantinople. That was in the great days of her grandeur when it was the annual duty of the reigning Doge to drop the symbolic marriage ring into the waves from the deck of the war galley, while the vast population revelled in the height of the *gaudeous* Carnival.

Almost equal in marvel with St. Mark's is the glorious palace of the Doges, fronting the open Guidecca with its white and sanguine marble façade, rising tier upon tier, from the light and graceful arches of the base to the noble heavy work of the summit. The entry through the court yard is made by way of the most majestic open air stairway in the world. Within are situated the great halls of audience, the council chambers, the apartments of the Doges. In one the ruling officers received the ambassadors of the great Powers, in another met the grand Council, and yet elsewhere the dread Council of Ten with its power of life and death over the citizens. For ancient Venice was an autocratic oligarchy of the most tyrannic type; commercial ability and patriotic loyalty often paved the way to the power which turned viper-like to poison its possessor, some seventeen of its Doges paying the penalty of greatness with a violent end. And away across the narrow canal, beyond the Bridge of Sighs, lay the dread Pozzi, the damp and dark cells, from which many a dark night witnessed the executioner convey the body of some strangled political suspect to drop the weighted sack into the depths of the sea.

From the windows of the Palace, what a prospect unfolds to the eye! Across the flashing waters of the Laguna—alive with merchants vessels, warcraft, gaily laden fruit barges and speeding gondolas—rise the graceful towers of San Giorgio Maggiore, with the white domes of Santa Maria della Salute to the Eastward of it. The church of the Redentore lies further off; and to the far south we see the long shore line of the Lido—the Lido, where Byron loved to gallop on his prized horses, and where now we find one of the world's greatest bathing resorts. As we leave

the Palace and glance up at its proud structure we no longer wonder that the great art critic spoke with rapture of the 'Stone of Venice' and wrote with enthusiasm of the 'Lamps of Architecture'. Much of the ancient glory remains imperishable; and still from the summit of the lofty column by the quay side the symbolic Lion of St. Mark seems to flash down fire from its eyes of rock crystal that face towards the long defied East.

Lovers of Art will revel in the works of Titian and Tintoretto, of Bellini and Veronese, gathered in the fine Academy or scattered in churches and palaces. And many a smaller church will hold the visitor spell-bound by its air of medieval charm. The light and imposing church of the Frari, the pantheon of Venice, with its rich tombs of ancient Doges and renowned warriors, will at least hold the visitor with its fascination. But it were vain to attempt to present the charm of Venice by chronicles of her by-gone greatness or catalogues of her wonders of architecture and art. It is a city which must be seen to be understood and apart from which no one can rightly claim to have made contact with the world's richest culture and most enduring beauty. Though somewhat of her ancient glory is passing with the dawn of this century of rush and fever, there yet remains more than enough to amply reward the visit due from every lover of the grandeur of the past.

"In Venice Tasso's echoes are no more,
And silent rows the songless gondolier;
Her palaces are crumbling to the shore,
And music meets not always now
the ear;
Those days are gone—but beauty still
is here,
States fall, arts fade—but beauty doth
not die,
Nor yet forget how Venice once was
dear,
The pleasant place of all festivity,
The revel of the earth, the masque of
Italy".

The Smoke of the British Empire

• When such stars as Madeleine Carroll, John Gielgud, Peter Lorre and Robert Young are directed by Alfred Hitchcock in a Gaumont-British film, based on Somerset Maugham's famed "Ashenden" stories, you have a right to expect the resulting "SECRET AGENT" to be a smash hit. And it certainly is! Watch for "SECRET AGENT" at your local theatre.

Madeleine Carroll — whom James Montgomery Flagg says "is more beautiful than Romney's portrait of Lady Hamilton — and that is about the tops" — looks every inch the lovely spy in "SECRET AGENT." Yet, when the weekend comes, she reverts to the simple life with the horses and cows and the piglets on her farm in Ashdown Forest, Sussex!

Miss Carroll, born in England, gave up her teaching — she is a B.A. — for the stage. Her work with Seymour Hicks introduced her to British studios, which have competed for her talents with Hollywood and the London stage ever since.

There is one thing British stars and Gold Flake Cigarettes have in common — their popularity is world-wide! And if you visited one of the British studios today, you'd find Gold Flakes the favourite smoke of the stars themselves.



Pocket tin of fifty
— 55 cents.

A shilling in London - a quarter here

W. D. & H. O. WILLS'

GOLD FLAKE
CORK TIP OR PLAIN
CIGARETTES

Kindly mention *CANADIAN GEOGRAPHICAL JOURNAL* when replying to Advertisements

EDITOR'S NOTE BOOK

W. HARVEY-JELLIE, Professor of Oriental Literature in Presbyterian College, Montreal — has held Presbyterian pastorates in England, Canada and the United States — served as Chaplain to the Highland Light Infantry: A graduate of the Universities of London, Paris, Shantung, and Montreal — he holds doctorates from three of these by examination — was for several years on Staff of McGill University as assistant Professor of English.

Is the author of works in Comparative Literature and in Old Testament Literature — contributes to many magazines in England, Canada and the United States (writing in both English and French): Is known as a popular lecturer and preacher and has travelled widely in western Europe.

GRACE F. MALKIN, is a teacher in the Primary Department of a Toronto Public School where the attendance is largely foreign. She is perhaps best known to children across Canada through her 'Outdoor Stories' published in the "Canadian Red Cross Junior" for the past five years.

BRUCE METCALFE is a professional musician as well as a pictorial photographer internationally known. He was one of the judges at the Ottawa International Salon of Photography in 1934 and 1935, and is to be there again in that capacity this year. He is a Past President of the Toronto Camera Club.

NOEL ROBINSON, newspaper man formerly of England, now of Vancouver, is especially fond of writing of pioneers' life and has made a first hand study of Indians and their life in British Columbia.

Served Overseas with the Canadian force.

Has published a book entitled "Blazing the Trail" and is the author of a number of chapters in a volume edited by Judge F. W. Howay, entitled "Builders of the West."

ANNOUNCEMENTS

Major D. L. McKeand, veteran leader of the Eastern Arctic Patrol has accepted the appointment of Special Representative of the Canadian Geographical Society, on this trip. He will contribute a feature article for the Journal profusely illustrated.


Sir James H. MacBrien, Commissioner, Royal Canadian Mounted Police, took off this month from Le Pas, Manitoba, on a 15,000 mile flight in Canada's North West Territories. He will contribute an article for the Journal in a later issue.

Readers of the Journal will find in the August issue, a variety of interest in articles dealing with Atlantic salmon; Loitering along Lake Ontario; Canada's Geological Survey; and "Hidden Island", visited by a white man for the first time in the last quarter century. Feature articles in the September issue include Canadian stamps and Canada's Last Frontier.

This year at the Canadian National Exhibition, Toronto, the Society has arranged for a booth on the Second Floor of the West Annex, Coliseum Building.

Elements of Geography by VERNON C. FINCH AND GLENN S. TREWARTHA. (New York: McGraw-Hill Book Co., Inc. 1936. 782 pages. price - \$4.00).

The book is a presentation of the study of earth regions through the treatment of their observable natural and cultural features. The material is arranged so as to place emphasis on the nature and distribution of the essential physical characteristics of the landscape and the significance of their areal association. It does not over-stress the processes which produced the land forms. It is thus a healthy reaction against the introduction of too much geomorphology in geographic courses for beginners. More and more geomorphology has crept into geographic



**TRAVELLERS
CHEQUES**

Are World Currency

They may be cashed or
spent the world over—
and are the safest and
most convenient travel funds whether
travelling by Rail, Ship, Motor or Plane.

Get them from any Agent of the
Canadian Pacific and most Banks.

courses of late years. The description of the origin of the land forms has not been neglected entirely however, but forms a subordinate part in the treatment of the description of the landscape.

The material is arranged so that student discussions are invited. One very excellent feature, from the instructor's viewpoint, is the serial numbering of the articles of the chapters, which enables one to give ready cross references for class room studies.

The not too frequent use of podzols, chernozems and isopleths and other super-technical derivatives, which, of recent years, has encumbered many geographical articles and which are so confusing to beginners in geographic courses, assist in the clarity of the presentation of the subject matters. These technical terms may be exposed for the edification of the student in the more advanced courses.

The introductory chapters deal with some of the fundamental geographic principles and general facts. The rest of the book is divided into three parts:

1. The natural elements of the landscape.
2. Material culture. Features resulting from human occupation of the land.
3. A study of the interrelation of natural features of a region and the evaluation of the resources of each realm for human use.

Diagrams and illustrations are clear and numerous.

Appendix B might include some Canadian and foreign maps to illustrate Drift-plains and also Ice-scoured plains, example of the latter not being included in the list.

The Geological Map by KENNETH W. EARLE, (London, Methuen & Co., Ltd., 1936, 316).

This book is intended especially for the use by British students of geography who require some knowledge of technical terms dealing with a study of geological maps. It confines itself chiefly to a description of the appearance of outcrops, unconformities, folds, faults and other geological phenomena, using diagrams for descriptive purposes and referring to British maps where examples of these may be seen.

One chapter deals with map reading and the construction of geological sections. The concluding chapter describes several British maps in detail and, in it, the

author interprets the sequence of geological events from the data provided on the maps.

Phenomena common in sedimentary rocks are dealt with in detail, but those of igneous and metamorphic rocks are relegated to one short chapter. If these were treated in greater detail, and an appendix added which would include some of the North American maps, the use of the volume would be greatly extended. It would make a valuable adjunct to the study of the interpretation of geological maps of this continent, and hence might be used as a text book.

D. A. Nichols.

Canada's Platinum Production

Canada is capable of supplying the major part of the world demand for platinum and its allied metals, according to the Department of Mines, Ottawa. One producer in the Sudbury district of Northern Ontario, is capable of contributing 300,000 ounces of the metals annually, world rate of consumption is about 200,000 ounces. This company's mines form the chief source of the metals in the Empire, and places Canada next to Russia among the world producers.

W. C. PITFIELD AND COMPANY, LIMITED

235 St. James Street
Montreal

INVESTMENT DEALERS

Wire Connection with
Principal Markets

Toronto	Ottawa	Quebec	Saint John
Moncton	Campbellton	Fredericton	
Halifax	Charlottetown	Vancouver	

PITFIELD & COMPANY

MEMBERS:

Montreal Stock Exchange Montreal Curb Market
Canadian Commodity Exchange Inc.

Orders Executed on all
Exchanges.

HEAD OFFICE:

235 St. James Street, Montreal

BRANCHES:

Ottawa Saint John Halifax Campbellton

AMONGST THE NEW BOOKS

GROWING USE OF MAPS IN CANADA

Canadians are each year making more use of maps according to the records of the Topographical and Air Survey Bureau of the Department of the Interior, which organization reports a continued marked increase in the demand for maps and plans as compared with last year.

It would be difficult to overstate the value of maps as a factor in the development of any country, especially of one that is so rich in natural resources as Canada. Less than twenty per cent of the Dominion's area of 3,700,000 square miles has been mapped, so that while the demand for maps is great, the area still to be covered with any degree of detail is enormous. However, by the utilization of air photographs and a minimum of ground control, the work is being expedited and maps sufficiently accurate for the present are being made and are filling a valuable purpose in opening up the country to explorers, foresters, prospectors, engineers, and tourists.

Prospecting for minerals and other like activities have been holding public interest for some time and to those engaged in this important work accurate maps are of the greatest assistance. A very good example of this is the case of the territory east of Gods lake in Manitoba. In 1929, a provisional edition of the Oxford House map sheet was issued showing Oxford lake and most of Gods lake but the area lying immediately to the east, which is also attracting a lot of attention from prospectors,

was very poorly mapped. The best map available of that area last year showed only five lakes. A new map is being made available this spring as a result of work done last year and it shows about 3,500 lakes in the same area. This area straddles the Ontario-Manitoba boundary and covers to a large extent the prospecting area discovered last autumn around Stull lake and eastwards to Sachigo river.

The Bishop Strachan School

College Heights, Toronto

Established over 65 Years

A Church of England Residential and Day School for Girls

Kindergarten to Junior and Senior Matriculation — Household Science, Art, Music, Physical Education with indoor and outdoor sports.

Principal: Miss E. M. Lowe, B.A.

Vice-Principal: Miss Rosseter,

Cheltenham and Froebel Institute,

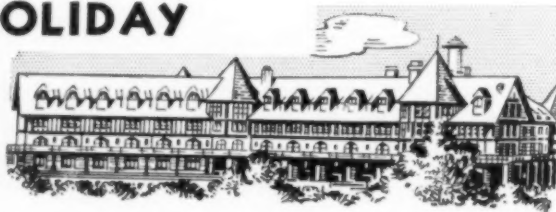
For Calendar apply to Bursar.

Enjoy a SEASHORE HOLIDAY

at the ALGONQUIN

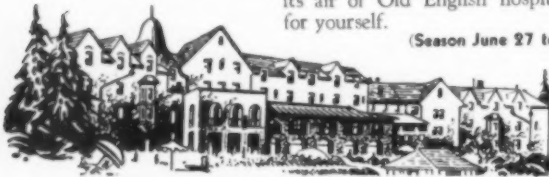
ST. ANDREWS-BY-THE-SEA

NEW BRUNSWICK



● This famous vacation spot in the nearby Maritimes offers everything . . . The health-giving tang of the sea air . . . Golfing on a championship course inspired by its Scottish prototype . . . Bathing in the sheltered waters of lovely Katy's Cove to the music of the hotel orchestra . . . boating, fishing, tennis, motoring . . . And what a spot for children! The modern, fireproof Algonquin Hotel is famous for its air of Old English hospitality . . . Come, sample it for yourself.

(Season June 27 to September 7)



Rates as low as

\$8 PER DAY

Doubles: from \$7 per person American Plan (Meals included)

Special rates for families

The PINES

DIGBY, Nova Scotia

Rates as low as

\$7 PER DAY

Double: from \$6 per person American Plan (Meals included)

Special rates for families

● In a 16-acre private park, surrounded by wooded groves and overlooking the blue waters of Digby Basin, stands the Pines, a modern, fireproof hotel. 18-hole golf course, tennis, boating, a salt water swimming pool in the hotel grounds . . . private cottage bungalows, each with bath and open fireplace, if you wish.

(Season June 27 to September 9)

For information, reservations, etc., communicate with Hotel Manager or your nearest Canadian Pacific Agent

LOW SUMMER ROUND TRIP RAIL FARES

Also in Nova Scotia, these fireproof hotels:

At Yarmouth, LAKESIDE INN (June 29 to Sept. 7)

At Kentville,

CORNWALLIS INN (Open all year)

Canadian Pacific Hotels

The spring of 1936 has seen the appearance of two unique periodicals designed to foster international friendship, and an appreciation among English-speaking people of some lesser-known countries of Europe. Our June number contained a brief notice of the Hungarian Quarterly published in London; now we welcome *The Anglo-Yugoslav Review*, also a quarterly, published in Belgrade under the auspices of the Society for promoting Anglo-Saxon culture in Yugoslavia. The Society, under the patronage of H. R. H. Prince Regent Paul, was founded in March of last year as a natural outgrowth of the English courses established three years ago in the Senior Pedagogical School in Belgrade. With few English members in the Society or as contributors to the periodical, most of the honours of this excellent first number, covering January to April 1936, must go to the enthusiastic Yugoslavian authors who, coming from many professions and walks of life, in irreproachable English and with a wealth of first-hand knowledge, have made known to us so many aspects of their country's life.

The first three plates furnish an admirable starting point for our consideration of the history and development of Yugoslavia, in the form of maps of (1) Yugoslavia (2) the Little Entente and (3) the Balkan Pact, by Petar Milivojevic, Associate Editor. Some brief editorial and historian articles follow; about forty pages are devoted to science and invention, including papers on the astronomical observatory in Belgrade, mineral resources, forestry, agriculture, education in Yugoslavia, with a notable paper on the eightieth jubilee of their famous Croatian inventor, Tesla. The section devoted to Letters and Arts comprises four delightful essays, — The Origins of our National Epics, New Archaeological Discoveries in Yugoslavia, Modern Music in Yugoslavia, and Shakespeare on the Belgrade stage. Contributions on historical sites, the beauty and diversity of the scenery and folk life; new developments in sport, and health cooperatives, enlivened by a series of charming illustrations, commend us to a study of this rich and fascinating land. The editors hope for an exchange of students, as well as an interchange of culture, and make an appeal for support of this enterprise among the people of Great Britain and North America.

The *Anglo-Yugoslav Review* is published at 2 Jaksiceva, Belgrade, Yugoslavia. Subscription price \$2.50 a year.

DONALD W. BUCHANAN, Secretary of the National Film Society of Canada has done an admirable piece of work in his *Report on Educational and Cultural Film in Canada*, published recently under a grant given by the Canadian Committee of the Carnegie Foundation (Ottawa, 1936, twenty-five cents). In the preliminary survey an account is

given of the objects sought and experience gained in other countries; in the British Film Institute, the United States Film Institute, Musée Pédagogique de France and the International Institute of Cinematography in Rome. There follows a statement of the urgent need for similar institutions in Canada and a carefully considered account of present activities in the various provinces by educational commissions, departments of education, museums, etc., with a discussion of such aspects of the question as relative values of films in teaching, mass showings raising of public taste and adult education.

Private film societies now exist in several Canadian cities and are affiliated with the National Film Society of Canada, incorporated in September 1935. The Society is a non-profit-making association, created to promote the study and appreciation of the film as an educational and cultural factor in the life of the Dominion.

Part Two of the report deals with the production and distribution of educational films in Canada, sources, difficulty of selection, tariff regulations, free trade in educational films, etc. Part Three makes a series of practical and practicable recommendations for future action, which would appeal to every Canadian who desires that our country should not lag behind in the use of this tremendously valuable instrument of education and culture.

Was it a prophetic instinct or the natural outcome of his temperament and rare powers as a historian, which brought to fruition just at this time Hilaire Belloc's latest book?

The publisher's caption, "The Battleground" fittingly introduces *Syria and Palestine: the Seed Plot of Religion*. (Philadelphia, Lippincott, 1936, \$4.00). Belloc deals with Palestine as the scene of conflict between the main opposing powers of civilization for more than three thousand years. He deals also with the great modern importance of the land, the conflict of opposing interests, the experiments of Zionism, the French attitude toward the three Syrian republics and the tension between the European occupation of the sea board and the vast Islamic world to the east and south. Those seeking a background for a study of events in Palestine to-day will find in this book just what they need couched in a style and language which have made Hilaire Belloc famous as a master of English prose.

Another book on the Holy Land strongly recommended by the late Lord Allenby, is *Footprints in Palestine*. (New York, F. H. Revell Co., 1936, \$2.50), by MADELEINE S. MILLER, expert traveller and an authority on the country.

Salar the Salmon, by HENRY WILLIAMSON. (Boston, Little Brown and Co., 1936, \$3.50). The Romans in their day had observed the mystery of the salmon's migration and called it Salar (The Leaper). In this book Mr. Williamson has depicted with poetic insight and a naturalist's knowledge, the complete life story of the salmon. The illustrations, by C. H. Tunnicliffe, must surely have given delight to the author as they will to his readers, so well do they catch the spirit of this rare and beautiful book. Readers of Mr. Williamson's earlier book—*Tarka the Otter*, will find here once more the "storehouse of truths finely perceived, set down with authenticity and beauty in prose of distinguished quality, with a poetic imagination that conveys the inner essence as well as the outer facts of the world of sea and river, of insects, birds, fish and animals, a changing world of infinite detail in which a delicate balance is maintained."

Custom is King: Essays presented to R. R. Marett on his Seventieth Birthday, June 13, 1936, edited by L. H. Dudley Buxton (London: Hutchinson, 1936, 12/6). The Rector of Essex College, Oxford, a classical scholar and philosopher, is perhaps more widely known as a great anthropologist who by the charm and interest of his teaching inspired many Oxford men to make anthropology their life work. Among the twenty-one contributors to this presentation volume are many well-known names of his students and colleagues. It contains papers of deep interest on subjects as far-ranging as Field work in Bougainville, Western seaways, Sun-gods on the West African Coast and a Naga Melanesian Culture-link. Canada is most ably represented by Diamond Jenness in his masterly essay on The Prehistory of the Canadian Indian, and by C. Marius Barbeau in a characteristically attractive article on The Modern growth of the totem pole on the North West coast. A bibliography of the Scientific Writings of Robert Ranulph Marett, edited by T. R. Penniman, forms a valuable conclusion to the volume.

The wife of a diplomat or a governor general in the British Dominions has unusual opportunities for seeing the world and of meeting prominent and distinguished people. The possession of insight and a literary gift has made these opportunities the occasion for some agreeable books of reminiscences, such as Lady Dufferin's "My Canadian Journal," and "Our Vice-Regal life in India." Of more recent date was the charming book, "We Twa", which was written jointly by the Marquess and Marchioness of Aberdeen. Her many friends and admirers in Canada will enjoy a further instalment of LADY ABERDEEN's memoirs "Musing of a Scottish Granny." (London, Heath Cranton, 1936, 6/0). Stories of her childhood in Scotland, her life in London, Ireland, Canada and elsewhere, the many prominent people who were her friends, Gladstone, chief among them, call up a vision of a happy and tranquil period, which seems very remote nowadays. Canadian friends are the subject of the last chapters, two notable figures being of particular interest—Sir William Van Horne and Father Lacombe, the Black-Robe Voyageur.

ROBERT ENGLAND has, in *The Colonization of Western Canada*, (London: King, 1935, 15/0), given us a well documented and valuable study of the growing period in our western lands, tracing the progress from poverty to prosperity of the cosmopolitan communities, who settled on our plains fifty years ago. This book of 342 pages has a map and thirty illustrations.

FRANS BLOM, of Tulane University, a very distinguished archaeologist and explorer has made live for us in the pages of his latest work a lost civilization. *The Conquest of Yucatan* (Boston: Houghton Mifflin, 1936, \$3.50) tells in detail and with many stirring passages from the chronicles left by soldiers and priests of Spain, the story of the long and complicated struggle for supremacy, which ended in the collapse of the great prehistoric civilization of the Mayas. The second half of the book is perhaps the more fascinating, as it brings together in vivid chapters the life of the Mayas as it has shaped itself in the mind of this skilful interpreter through his own discoveries and those of the many explorers, who have striven to unveil the secrets of the early inhabitants of Yucatan.

A Canadian, HARWOOD STEELE, gives us a well documented book *Policing the Arctic* (Toronto: Ryerson, 1936, \$3.50). As son of Sir Sam Steele and as historian of the Government Arctic expedition of 1925, Mr. Steele is exceptionally well qualified to chronicle the records of the Mounted Police during the years from 1894 to 1935. There are more than thirty full-page illustrations, an extensive bibliography, a map of northern Canada, and an index.

For books in a lighter vein suitable for holiday reading, one may indulge in *Playtime in Portugal*, by JOHN GIBBONS (London: Methuen, 1936, 6/). Mr. Gibbons portrays, with the help of charming halftone plates and an end map, a newer Portugal in the far south, just beginning to be discovered by tourists. We are told that its attractions include a semi-African climate, Moorish remains, unspoiled people and reasonable prices, and that the Portuguese ambassador commended an earlier book of Mr. Gibbons for its keen observation and sympathy.

Or let us turn back to England and read IRIS WEDGEWOOD's *Fenland Rivers*, (London: Rich and Cowan, 1936, 7/6). Illustrated by 48 coloured reproductions of drawings by Henry Rushbury, R.A., and four maps, this book is a pleasantly rambling description of the fen country in Lincolnshire and Cambridgeshire and of the rivers Ouse, Neve, Welland and Witham.

English village life has surely found its most ardent advocate in HUMPHREY PAKINGTON's *English villages and hamlets*, (London, Batsford, 1936, 7/6), for in this book the 385 most attractive villages of England are described. S. R. Jones contributes 26 drawings, there are 131 photographs by W. F. Taylor and others, and 2 maps. A foreword by E. V. Knox and introduction by G. M. Young would seem to make this a book "of all the talents" needed for our delectation.

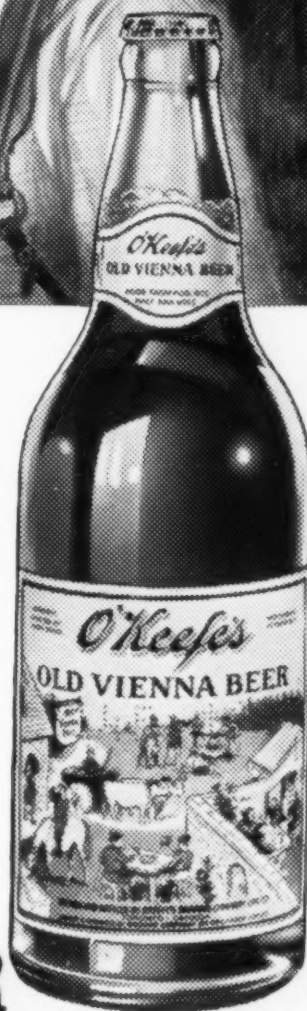
Florence E. Forsey



Certainly I know!
O'KEEFE'S IS BEST!

A pleasing mellowness that comes from proper ageing—a sparkling, refreshing taste that results from the choicest hops and finest Canadian malting barley are the things on which the reputation of O'Keefe's Old Vienna Beer has been built. Try Old Vienna to-day. The first glassful will convince you, too, that O'Keefe's is Best. Phone your order to-day.

O'Keefe's
OLD VIENNA BEER



IN THE BREWING BUSINESS SINCE 1846

NEW MAP OF NOVA SCOTIA

(part of a Map of the World)

Glancing at the new map of Nova Scotia just issued by the Topographical and Air Survey Bureau, Department of the Interior, one finds it difficult to realize that, according to geologists, during very early times the entire area was part of an elevated sea-bottom that extended from Yarmouth to Labrador, until mountain-forming movements set in which resulted in its present-day formation and appearance.

Study of the map shows that Nova Scotia is thrust conspicuously out into the Atlantic ocean from the southeast extremity of New Brunswick. Save for the isthmus of Chignecto, thirteen miles wide and connecting it with the mainland to the northwest, the peninsula is surrounded on all sides by water, consisting of the Bay of Fundy, the Atlantic ocean and the Gulf of St. Lawrence. Nova Scotia is 350 miles in length, with a breadth varying from 50 to 100 miles, and is 21,427 square miles in area. The long coast-line and the network of lakes and rivers offers a good choice of localities for many species of fish, and as there are no exclusive fishing rights granted in the province, the angler may fish where he chooses in publicly owned waters. In view of the easy accessibility to the game areas, Nova Scotia has a special attraction for the sportsmen and some fine trophies of moose, deer, and other animals are secured during the open season.

The discoverer of the peninsula, John Cabot, landed on the east coast of Cape Breton in 1497. Other early voyagers state in their memoirs that seams of coal, threading the cliffs in that part of the province, were worked with crowbars, for French and English cargoes. These deposits are now mined extensively, some of them extending far under the sea.

At almost the opposite end of the map lies part of the "Acadia" country, now the scene of fruit-orchards, extending nearly 100 miles throughout the Annapolis and Cornwallis valleys. Between 85 and 90 per cent of the annual crop of apples produced in this section of the province is exported to the United Kingdom, the remainder being consumed locally and also in the provinces of Quebec and Ontario.

Other classes of information shown on the map are counties, with their boundary lines; centres of population; railway lines, principal roads; lakes, rivers, and canals; heights above sea-level in figures; and by distinctive tinting altitudes to the nearest hundred metres. Along the coast-line, bays, harbours, coves, points, and islands are indicated, while the depth of water is also given by tints to the nearest hundred metres.

Although the map is primarily one of Nova Scotia, it includes the Magdalen Islands, also Prince Edward, and the eastern part of New Brunswick, with their extensive coast-lines and other maritime features similar to the peninsula province. It is the third map sheet issued in Canada, of a series that eventually will comprise an international map of the world. The many hundreds of maps required to complete the task are being published gradually by the different countries carrying on the undertaking and to ensure uniformity, all of the co-operating agencies are adhering to a standard set of specifications with regard to scale, symbols, conventional signs, style

of lettering, projection and area, in preparing the map sheets of sections of their respective countries.

The "Nova Scotia" map has been prepared on a scale of one to one million or approximately 16 miles to one inch, and it is 25 by 25 inches in size, while the area which it covers extends from longitude 60° to longitude 69° and from latitude 44° to latitude 48°. In Canada a charge of 25 cents is made for the map. It might be noted, however, that when this map or any of the one thousand or more maps which are distributed by this Bureau are required for educational purposes in the schools, a discount of forty per cent is allowed. To applicants outside of Canada the price of the new map is 75 cents, in accordance with the general regulations of the International Map of the World Committee.

Applications for the "Nova Scotia" map, or for information about any other maps, should be addressed to the Surveyor General, Department of the Interior, Ottawa.

FOR COULONGE MAP SHEET

The Topographical and Air Survey Bureau, Ottawa, has just issued a new map sheet known as the Fort Coulonge sheet. This map sheet shows a portion of the country very typical of a cross section of Eastern Canada. It is traversed by the Ottawa River and several large tributaries. The southwesterly half of the area is agricultural land; the northeasterly is a forested country, rocky and rough as a whole, but containing little settlements in the valleys. Local industries are connected with lumbering and dairying, while power is generated for transmission to the larger centres of population in the two provinces. Railways and main highways make the region readily accessible and provide means of transportation to the neighbouring cities and towns for the produce of the farm, dairy, and forest.

The northern part of this area is an excellent fish and game country. Bass, lake trout, brook trout, and pickerel are plentiful in the lakes and streams. Many fish and game clubs have acquired fishing rights on some of the waters. Deer and partridge are numerous and afford excellent opportunities for sport in the open season. All information concerning regulations can be obtained from the Provincial Government at Quebec City.

The highest point within the area mapped is O'Brien Mountain, over 1,300 feet, in Cawood township; the lowest elevation is on Lake Deschenes, 192 feet. The contour lines were drawn from the air photographs by stereoscopic examination using as control points, elevations obtained in the field.

Not many years ago, a definite link with the early explorations of the Ottawa River was discovered in the finding, near Cobden, three hundred years after its loss, of an astrolabe lost by Champlain.

NATURAL GAS IN ONTARIO

Thousands of millions of cubic feet of natural gas have been added to the reserve supply in southwestern Ontario as a result of well-drilling operations in 1935, states the Department of Mines, Ottawa, and the threatened shortage of supply that faced the consumers two years ago no longer exists.